

1994

UNITED STATES MASTERS SWIMMING CODE OF REGULATIONS AND

RULES OF COMPETITION

Published by
United States Masters Swimming, Inc
Two Peter Avenue
Rutland, MA 01543

Telephone: (508) 886-6631 FAX: (508) 886-6265

Edited by Julie M Paque with assistance from the Rule Book Editorial Board

This is an official publication of United States Masters Swimming, Inc., the National Governing Body for Masters Swimming in the United States Additional copies of this book may be purchased at a cost of \$7 00 from the USMS National Office at the above address

Copyright 1994 by United States Masters Swimming, Inc. Portions of this book are reprinted with permission from United States Swimming Rules and Regulations (Copyright 1989, 1990, 1991, 1992, 1993, 1994)

Cover design by Scott Rabalais, art work by Liza Caldwell Fitness Frog' is the official mascot of the February Fitness Challenge, a postal event sponsored by United States Masters Swimming

Dedication

The 1994 United States Masters Swimming Code of Regulations and Rules of Competition is dedicated to the many volunteers who donate countless hours to our organization without pay or honor.

UNITED STATES MASTERS SWIMMING, INC.

EXECUTIVE COMMITTEE:

President - Mel Goldstein, 6456 Broadway, Indianapolis, IN 46220

Vice-President - Jim Miller, 1471 Johnston-Willis Drive, Richmond, VA 23235

Secretary - Suzanne Rague, 21 Deeringwood Lane, Babylon, NY 11702

Treasurer - Lucy Johnson, P. O. Box 3368, Long Beach, CA 90803

Past President - Daniel Gruender, 3329 N. Valencia Lane, Phoenix, AZ 85018

Legal Counsel - Jack Geoghegan, 155 Osborn Road, Rye, NY 10580

Chairman, Zone Committee - Betsy Durrant, 211-66th Street, Virginia Beach, VA 23451

NATIONAL OFFICE:

Executive Secretary - Dorothy Donnelly, 2 Peter Avenue, Rutland, MA 01543, (508) 886-6631

National Registrar - Diane and Bill Black, P.O. Box 88863, Atlanta GA 30356-8863, (404) 698-8020.

MAJOR CHANGES FOR 1994

Liability Release: A new sentence, "AS A CONDITION OF MY PARTICIPATION IN THE MASTERS SWIMMING PROGRAM OR ANY ACTIVITIES INCIDENT THERETO, I HEREBY WAIVE ANY AND ALL RIGHTS TO CLAIMS FOR LOSS OR DAMAGES, INCLUDING ALL CLAIMS FOR LOSS OR DAMAGES CAUSED BY THE NEGLIGENCE, ACTIVE OR PASSIVE, OF THE FOLLOWING: UNITED STATES MASTERS SWIMMING, INC., THE LOCAL MASTERS SWIMMING COMMITTEES, THE CLUBS, HOST FACILITIES, MEET SPONSORS, MEET COMMITTEES, OR ANY INDIVIDUALS OFFICIATING AT THE MEETS OR SUPERVISING SUCH ACTIVITIES." replaces the old sentence, "I hereby waive any and all rights to claims for losses or damages arising out of my participation in the Masters Swimming program or any activities incident thereto against United States Masters Swimming, Inc., the Local Masters Swimming Committees, the clubs, host facilities, meet sponsors, meet committees, or any individuals officiating at the meets or supervising such activities, as a condition of my participation in Masters Swimming." This new sentence must be printed in all capital letters for emphasis. (Articles 201.1.2B, 202.1.1G(4), 202.2.1F, 203.1, 301.3)

One-Event Registration: An LMSC may offer a single-event registration which allows an athlete to participate in ONE sanctioned event. (Article 201.1.2)

Proof of Registration: An LMSC may set its own standard of proof of registration for local meets. (Article 202.1.1.G(2))

Sanction/Recognition: The Sanction/Approval article has been renamed "Sanction/Recognition" and reordered for clarity. Events previously referred to as Approved Events are now referred to as Recognized Events. Also, two sections have been added: one which provides that sanctions issued to one organization cannot be transferred to another (Article 202.1.1C); and one which provides that sanctions may not be issued to any organization whose interest is purely commercial, or where the event is to be promoted solely for profit (Article 202.1.1D). (Articles 202.1, 202.2)

TABLE OF CONTENTS

Preamb	le		11
Mission	Stat	ement and Goals and Objectives of USMS	11
Glossa	r y		12
		PART ONE: Swimming Rules	
Autiala	401.	Starts, Strokes, and Relays	4 5
Article	101:		
101		Starts	
101		Breaststroke	
101		Butterfly	
101		Backstroke	
101		Freestyle	
101		Individual Medley	
101	.7	Relays	18
Article	102:	Swimming Competition	19
		Eligibility	
102 102		Age Determining Date	
102		Age Groups	
102		Warm-Up/Warm-Down	
102		Events	
102		Event Limit	
102		Entry Fees	
102		Scratch Procedures	
102		Relays	
102	.10	Lane Assignments - Seeding - Counters	
102	.11	Awards	
102	.12	Scoring	
102	.13	Change of Program and Postponement	
102	.14	Costume	
102	.15	Disqualifications	27
102	.16	Protests	28
102	.17	Required Officials	29
102	.18	Meet Director	29
102	.19	Meet Committee	29
102	.20	Smoking	30
Article	103:	Officials and Their Duties	
103	.1	Referee	30
103	.2	Starter	
103	.3	Recall Starter	33
103	. 4	Recall Rope Operator	33
103	.5	Judges	33

103	.6	Timers	34
103	.7	Timing Equipment	36
103	.8	Official Time	
103	.9	Clerk of Course	40
103	.10	Marshals	40
103	.11	Announcer	
103	.12	Recorder of Records	
103	.13	Press Steward	41
Article	104:	National Championship Meets	41
104	. 1	Meet Categories	41
104	.2	Meet Name	
104	.3	Awarding of a National Championship Meet	41
104	. 4	USMS Assistance and Agreements	43
104	.5	Conduct of National Championship Meets	
		·	
Article	105:	Records, Top Ten Times, and All-American	
		Recognition	50
105		Requirements for Records and Top Ten Times	EC
105		Top Ten Times	5t
105		USMS National Records	
105		All-American Recognition	
105		World Records	
105	. 5	World Records	
Article	106:	Health and Safety Regulations for Competition	52
Article 106		Health and Safety Regulations for Competition Medical Examination	
	.1		52
106 106	.1 .2	Medical Examination	52 53
106 106 Article	.1 .2 107:	Medical Examination Medical Equipment Facilities Standards	52 53
106 106 Article 107	.1 .2 107:	Medical Examination Medical Equipment Facilities Standards Definitions	52 53 53
106 106 Article 107 107	.1 .2 107: .1	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions	52 53 53
106 106 Article 107 107	.1 .2 107: .1 .2	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls	52 53 53 53
106 106 Article 107 107 107	.1 .2 107: .1 .2 .3	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings	52 53 53 53 54
106 106 Article 107 107 107 107	.1 .2 107: .1 .2 .3 .4	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System	52 53 53 54 54
106 106 Article 107 107 107 107	.1 .2 107: .1 .2 .3 .4 .5	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature	
106 106 Article 107 107 107 107 107	.1 .2 107: .1 .2 .3 .4 .5 .6	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders	
106 106 Article 107 107 107 107 107 107	.1 .2 107: .1 .2 .3 .4 .5 .6 .7	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment	
106 106 Article 107 107 107 107 107 107	.1 .2 107: .1 .2 .3 .4 .5 .6 .7 .8	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting	
106 106 Article 107 107 107 107 107 107 107	.1 .2 107: .1 .2 .3 .4 .5 .6 .7 .8 .9	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting No Smoking Signs	
106 106 Article 107 107 107 107 107 107 107	.1 .2 .1 .2 .3 .4 .5 .6 .7 .8 .9	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting No Smoking Signs Starting Platform	
106 106 Article 107 107 107 107 107 107 107 107	.1 .2 .1 .2 .3 .4 .5 .6 .7 .8 .9 .10	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting No Smoking Signs Starting Platform Floating Lane Lines	
106 106 Article 107 107 107 107 107 107 107 107	.1 .2 .1 .2 .3 .4 .5 .6 .7 .8 .9 .10 .11 .12	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting No Smoking Signs Starting Platform Floating Lane Lines Backstroke Flags and Lines	
106 106 Article 107 107 107 107 107 107 107 107 107	.1 .2 .1 .2 .3 .4 .5 .6 .7 .8 .9 .10 .11 .12	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting No Smoking Signs Starting Platform Floating Lane Lines Backstroke Flags and Lines Loudspeaker Start System	
106 106 Article 107 107 107 107 107 107 107 107 107	.1 .2 .1 .2 .3 .4 .5 .6 .7 .8 .9 .10 .11 .12	Medical Examination Medical Equipment Facilities Standards Definitions Racing Course Dimensions Racing Course Walls Pool and Bulkhead Markings Overflow Recirculation System Water Temperature Ladders Other Deck Equipment Lighting No Smoking Signs Starting Platform Floating Lane Lines Backstroke Flags and Lines	

	7.17 7.18	Automatic Timing Equipment	
	PART	TWO: Administrative Regulations of Competition	
Article	201:	Athlete Registration and Representation	59
20	1.1	Membership of Athletes	59
20	1.2	Representation	59
20	1.3	Travel Permits	30
Article	202:	Sanction/Recognition	30
20	2.1	Sanctions	30
20	2.2	Recognized Events	31
Article	203:	Liability Release	32
Р	ART T	HREE: Long Distance/Open Water Swimming Rules	
Article	301:	Administration	33
30	1.1	Organization	33
	1.2	Registration and Sanctions	
30	1.3	Liability Release	33
Article	302:	Events	63
30	2.1	Definition	53
30	2.2	Events	64
Article	303:	Safety Precautions	56
30	3.1	Safety Standards	66
30	3.2	Escorted Swims	
Artiolo	204.	Conduct of the Competition	67
	4.1 4.2	Starts	
	4.2	Seeding	
		Costume	
	4.5	Officials	
30	4.6	Disqualifications	69
30	4.7	Age Groups	69
Article	305:	National Long Distance/Open Water Championship Meets	69
30	5.1	Eligibility	69

Page	8
------	---

305.2 305.3 305.4 305.5 305.6 305.7 305.8 305.9 305.10 Article 306: 306.1	Events 69 Site Selection 70 Contract 71 Financial 71 Entry Fees 71 Rules of Conduct 71 Results 72 Club Scoring 72 Awards 72 All-American Recognition and Records 73 All-American Recognition 73 Records 73
PART	FOUR: Athletes' Rights, Hearings, and Appeals
Article 401:	Athletes' Bill of Rights74
401.1	Protection74
401.2	Equal Opportunity74
401.3	Reporting74
401.4	Investigation
Article 402:	Review Section74
402.1	Composition of the Review Section74
402.2	Jurisdiction and Authority of the Review Section
402.3	Procedures
Article 403:	Appeal76
403.1	Appeal Procedures76
	T FIVE: USMS, Inc.: Organization and Bylaws Membership
501.1	·
501.1 501.2	Membership Categories
501.3	Equal Opportunity
Article 502:	Local Masters Swimming Committee (LMSC)77
502.1	LMSC Membership77
502.2	Bylaws
502.3	Annual Meeting77
502.4	Election of Officers

502. 502. 502.	6	Filing of Bylaws	78
Article 4	503:	House of Delegates	78
503.		Membership	
503. 503.		Powers	
503.		Meetings of the House of Delegates	
		3	
Article !	504:	Officers	79
504.	1	Positions	.79
504.	2	Elections and Term of Office	
504.	3	Vacancies	79
504.	4	Duties of Officers	79
Article	ENE.	Board of Directors	90
505.		Membership	
505.		Term of Office	
505.		Membership Requirements	
505. 505.		Vacancies Powers	
505.		Meetings	
505.		Quorum	
505.		Voting Privileges	
Article	506:	Committees	.81
506.	1	Executive Committee	.81
506.	2	Standing Committees	.82
506.	3	Ad Hoc Committees	.86
Article	507:	Financial Policy	.86
507.	1	Fiscal Year	26
507.		Controller	
507.		Fees	
Article	508:	Indemnification and Dissolution	.87
508.	1	Indemnification	.87
508.	2	Dissolution	.87
		PART SIX: Amendment Procedures	
Autiolo	C04		
		Amendments	.88
601	1	Committee Jurisdiction	00

601.2	Submission of Proposed Amendments	88
601.3	Modification of Proposed Amendments	88
601.4	Adoption of Proposed Amendments	
601.5	Effective Date	89
	APPENDICES	
Appendix A	A: Records	91
	n's Records	
	Records	
	Records	
	istance Records	
	. Information for Most Diseases and Officials	440
	3: Information for Meet Directors and Officials	
	ation of Meet Results	
	nces Between USS and USMS Rules	
USMS	and World Record Applications	119
Appendix C	: National and International Masters Swimming	
• •	Schedule	123
USMS	National Conventions	123
USMS	National Championship Meets	123
	Long Distance National Championship Meets	
	ISI Championship Meets	
	·	
Appendix D): Zone and LMSC Boundaries	125
Zones		125
LMSC	Numeric Codes and Abbreviations	125
Map of	Zone and LMSC Boundaries	126
LMSC	Boundaries	127
	T. HOMO. Birratama	400
	E: USMS Directory	
	Executive Committee	
	National Office	
	epresentatives and LMSC Chairmen	
USMS	Committees	132
	I Appointments and Liaisons	
Alphab	etical Directory	135
Appendix F	: USMS History	141
	ents of the Ransom J. Arthur Award	
	ents of the USMS Coach-of-the-Year Award	
	National Championship Meets	
	Annual Meetings and National Officers	
COVIC	Annual Meetings and Mational Officers	143
Appendix (G: USMS Adapted Swimming Guidelines	144
inday		167

Preamble

United States Masters Swimming (USMS) is an organization of sportswomen and sportsmen founded in 1970 and dedicated to the premise that the lives of participants will be enhanced through aquatic physical conditioning. USMS supports and encourages competitions among its members and those of other nations. This book establishes certain rules and regulations for the conduct of the organization, the participants, and the competitors in the spirit of good sportsmanship.

MISSION STATEMENT OF UNITED STATES MASTERS SWIMMING

To promote fitness and health in adults by offering and supporting Masters swimming programs.

GOALS AND OBJECTIVES

- A To encourage and promote improved physical fitness and health in adults.
- B To offer adults the opportunity to participate in a lifelong fitness and/or competitive swimming program.
- C To encourage organizations and communities to establish and sponsor Masters swimming programs.
- D To enhance fellowship and camaraderie among Masters swimmers.
- E To stimulate research in the sociology, psychology, and physiology of Masters Swimming.

GLOSSARY

Aggregate (Composite) Time - times achieved by four individuals in separate starts which are added together to arrive at a relay time for entry purposes.

Anchored (Starting Platform) - stable at all times without human aid.

Body - the torso, including shoulders and hips.

Calm State or Surface - normal level surface of water without turbulence.

Club - an organization or group of permanent character that is registered with the Corporation through its LMSC and that actively promotes and/or participates in Masters Swimming.

Corporation - United States Masters Swimming, Inc. (USMS).

Course - designated distance over which the competition is conducted.

- * Long Course 50 meters (55 yards to be recorded as 50 meters).
- * Short Course 25 yards or 25 meters.

Deck Entered - all entries are accepted on the first or later day of that meet and subsequently seeded into events.

Dual Meet - competition between two clubs.

End of Course - designated wall for turns or finishes.

Event - any race or series of races in a given stroke and distance.

FINA - Federation Internationale de Natation Amateur (International Federation of Amateur Swimming).

First Day of Meet - day on which first competitive swimming event is conducted.

Foreign Swimmer - athlete member of a country or swimming federation, other than the Corporation, who competes in USMS sanctioned events.

Heat - a division of an event.

His - generic term of reference designating female and male equally.

Horizontal - parallel to the surface level of the water.

IOC - International Olympic Committee.

Initial Distance - that first portion of a race for which an official time may be recorded but which is not itself a completed event.

Lane - the specific area in which the swimmer is assigned to swim.

Lane Line - continuous floating markers attached to a line stretched from the starting end to the turning end for the purpose of separating adjacent lanes.

Lane Markings - the guide lines on the bottom of the pool and in the center of the lanes running from the starting end to the turning end.

Last Day of the Meet - day on which last competitive swimming event is conducted.

Leg - the part of the relay event that is swum by a single team member.

Length - extent of the course from end to end.

LMSC - Local Masters Swimming Committee, a division of the Corporation, with supervisory responsibilities within a specified geographic territory.

Malfunction - a mechanical or electronic equipment failure.

Manual Start - the start of any timing device by an individual in response to the same starting signal given to the swimmers.

Mark - (take your) starting position.

Masters - word to be used in that form only; not to be used as a descriptive word; to be used with a capital "M".

May - permissive, not mandatory.

Meet - an event or series of events held under a single sanction or recognition and conducted within ten consecutive days, except for postal meets.

Member - an individual, club, or organization registered with the Corporation.

MSI - Masters Swimming International.

Open Competition - competition which any qualified individual, club, or organization may enter.

Pool - the physical facility in which the competition is conducted.

Propulsive - having the power to propel.

Recognized Meet - a designated meet conducted by organizations other than USMS from which swimmers may have their times accepted for recording purposes by USMS. An observer designated by USMS must be present to attest that the conduct of competition conforms to all relevant USMS rules and meet standards.

Registered - enrolled as a member of the Corporation and the LMSC.

Reinstatement - return of all or limited rights of membership in the Corporation.

Sanction - the written authorization of an LMSC to permit members to participate in a specific competition, demonstration, clinic, exhibition, or Swim-A-Thon ®.

Scissor - use of the top of the instep of one foot and the bottom of the other foot in the propulsive part of the kick.

Scratch - withdraw an entry from an event or fail to report to the assigned lane in the assigned heat.

Seed - distribute swimmers among the required number of heats and/or lanes, based on submitted times.

- Deck-seeded all events are seeded at the meet with entries received prior to or at the meet.
- Pre-seeded all events are seeded prior to the day of competition according to submitted times.

Shall - mandatory.

Simultaneously - at the same instant.

Split Time - time recorded from official start to completion of an initial distance within a longer event.

Still Water - water contained within four walls or landlocked, having no perceptible current or movement other than that caused by wind or by swimmers.

Submitted Times - those filed with an entry as having been previously achieved or reasonably estimated.

Suspension - deprivation of all rights of membership in the Corporation.

Team - a group of swimmers representing the same club in a competition.

Timed Finals - competition in which only heats are swum and final placings are determined by the times performed in the heats.

Unattached - an individual member who does not represent a club of the Corporation.

USAS - United States Aquatic Sports, Inc.

USMS - United States Masters Swimming, Inc.

USS - United States Swimming, Inc.

Wall - the vertical portion of the pool wall, the contiguous surface of the deck and overflow gutters, the front portion of the starting block or platform, or the touch pad at the end of the course.

Zone - a geographic section of the country that includes all LMSCs within that section.

PART ONE: SWIMMING RULES

All provisions under *Part One: Swimming Rules*, unless otherwise specified, are effective beginning January 1, 1994, and until changed. Rules in effect on the first day of a meet shall govern throughout the meet.

Part One: Swimming Rules is based upon Articles 101, "Individual Strokes and Relays," and 102, "Conduct and Officiating of all Swimming Competition," of the U. S. Swimming Technical Rules which, as amended, will govern all Masters competitions.

All competitive swimming events held under Corporate sanction shall be conducted in accordance with the following rules which are designed to provide fair and equitable conditions of competition and promote uniformity in the sport so that no swimmer shall obtain unfair advantage over another.

It is not the purpose of the Code of Regulations and Rules of Competition of United States Masters Swimming (the national governing body) contained herein to set standards of care for the safety of the swimmer. Safety considerations should be addressed by the swimmer, the swim coach, and the local public entity or pool owner where events are held.

ARTICLE 101: STARTS, STROKES, AND RELAYS.

101.1. STARTS

.1 Forward Start - The forward start may be taken from the starting block, the pool deck, or a push from the wall. On receiving clearance from the Referee (for all events except backstroke and medley relay) the Starter shall direct the swimmers to assume a position with at least one foot at the front of the block, the edge of the deck, or on the wall before the command, "Take your mark." Those starting in the water must have at least one hand in contact with the wall or starting block.

.2 Backstroke Start

- A Short course yards The swimmers shall line up in the water facing the starting end with both hands placed on the gutter or on the starting grips. The feet may be placed in any position on the wall or on the gutter of the pool, and the swimmer may assume any desired starting position which does not remove either foot completely from the water, or either hand from the starting grips or the pool edge. Standing in or on the gutter is not permitted at any time before the start. A backstroke starting block may not be used.
- B Short course meters and long course meters The swimmers shall line up in the water facing the starting end with both hands placed on

Page 16 PART ONE

the gutter or on the starting grips. Prior to the command, "Take your mark," and until the feet leave the wall at the starting signal, the swimmer's feet including the toes shall be placed under the surface of the water. Standing in or on the gutter is not permitted at any time before the start. A backstroke starting block may not be used.

101.2. BREASTSTROKE

- .1 Start The forward start shall be used.
- .2 Stroke From the beginning of the first armstroke after the start and after each turn, the body shall be kept on the breast and both shoulders shall be in line with the water surface. The arms shall move simultaneously and in the same horizontal plane without any alternating movement. The hands shall be pushed forward together from the breast on, under, or over the surface of the water and shall be brought back on or under the surface of the water. The hands shall not be brought beyond the hip line, except during the first stroke after the start and each turn. Some part of the swimmer's head shall break the surface of the water at least once during each complete cycle of one arm stroke and one leg kick, in that order, except after the start and each turn the swimmer may take one arm stroke completely back to the legs and one leg kick while wholly submerged. The head must break the surface of the water before the hands turn inward at the widest part of the second stroke.
- .3 Kick All vertical and lateral movements of the legs shall be simultaneous. The feet must be turned outward during the propulsive part of the kick movement. A scissors, flutter, or downward butterfly kick is not permitted. Breaking the surface with the feet shall not merit disqualification unless followed by a downward butterfly kick.
- .4 Turns At each turn, the touch shall be made with both hands simultaneously at, above, or below the water surface, and the shoulders shall be in line with the water surface. The head may be submerged after the last arm pull prior to the touch, provided it breaks the surface of the water at some point during any part of the last complete or incomplete stroke cycle preceding the touch. Once a touch has been made, the swimmer may turn in any manner desired. The shoulders must be at or past the vertical toward the breast when the feet leave the wall and the form prescribed in Article 101.2.2 must be attained from the beginning of the first arm stroke.
- .5 Finish At the finish the touch shall be made with both hands simultaneously at, above, or below the water surface. The body shall be on the breast and the shoulders in line with the water surface. The head may be submerged after the last arm pull prior to the touch, provided it breaks the surface of the water at some point during any part of the last complete or incomplete stroke cycle preceding the touch.

101.3. BUTTERFLY

. 1 Start - The forward start shall be used.

- .2 Stroke After the start and after each turn, the swimmer's shoulders must be at or past the vertical toward the breast. One or more leg kicks are permitted, but only one arm pull under water, which must bring the swimmer to the surface. From the beginning of the first arm pull, the swimmer's shoulders shall be in line with the water surface. Both arms must be brought forward over the water and pulled back simultaneously.
- .3 Kick All up and down movements of the legs and feet must be simultaneous. The position of the legs and feet need not be on the same level, but they shall not alternate in relation to each other. The breaststroke or whip kick may be used exclusively or interchangeably with the dolphin kick while doing the butterfly stroke at any time during the race. However, when the breaststroke or whip kick is used, the arms must be recovered over the top of the water at least once per breaststroke kick, except after the last such kick before the turn or finish. A scissors kicking movement is not permitted.
- .4 Turns At each turn the body shall be on the breast and the shoulders in line with the water surface. The touch shall be made with both hands simultaneously at, above, or below the water surface. Once a touch has been made, the swimmer may turn in any manner desired. The swimmer's shoulders must be at or past the vertical toward the breast when the feet leave the wall.
- . 5 Finish At the finish the touch shall be made with both hands simultaneously at, above, or below the water surface. The body shall be on the breast and the shoulders in line with the water surface.

101.4. BACKSTROKE

- .1 Start The backstroke start shall be used.
- .2 Stroke Standing in or on the gutter (all courses) or curling the toes over the lip of the gutter (short course meters or long course meters) is not permitted immediately after the start. Swimmers shall push off on their backs and continue swimming on their backs throughout the race. Some part of the swimmer must break the surface of the water throughout the race, except it shall be permissible for the swimmer to be completely submerged during the turn and for a distance of not more than 15 meters (16.4 yards) after the start and after each turn. By that point, the head must have broken the surface of the water.
- .3 Turns Upon completion of each length, some part of the swimmer must touch the wall. During the turn the shoulders may turn past the vertical toward the breast. If the swimmer turns past vertical, such motion must be part of a continuous turning action, and the swimmer must return to a position on the back before the feet leave the wall.
- .4 Finish Upon the finish of the race, the swimmer must touch the wall while on the back.

101.5. FREESTYLE

. 1 Start - The forward start shall be used.

Page 18 PART ONE

- .2 Stroke Freestyle means that in an event so designated the swimmer may swim any style, except that in a medley relay or individual medley event, freestyle means any style other than butterfly, breaststroke, or backstroke.
- .3 Turns Upon completion of each length, the swimmer must touch the wall.
- .4 Finish The swimmer shall have finished the race when any part of the swimmer touches the wall after completing the prescribed distance.
- 101.6. INDIVIDUAL MEDLEY The swimmer shall swim the prescribed distance in the following order: the first one-fourth, butterfly; the second onefourth, backstroke; the third one-fourth, breaststroke; and the last one-fourth, freestyle.
- . 1 Start The forward start shall be used.
- .2 Stroke The stroke for each one-fourth of the designated distance shall follow the prescribed rules for each stroke.

.3 Turns

- A Intermediate turns within each stroke shall conform to the turn rules for that stroke.
- B The turns when changing from one stroke to another shall conform to the finish rules for the stroke just completed, and shall be as follows:
 - Butterfly to backstroke The swimmer must touch as described in Article 101.3.5. Once a legal touch has been made, the swimmer may turn in any manner, but the shoulders must be at or past the vertical toward the back when the feet leave the wall.
 - 2. Backstroke to breaststroke The swimmer must touch the wall while on the back. Once a legal touch has been made, the swimmer may turn in any manner, but the shoulders must be at or past the vertical toward the breast when the feet leave the wall and the prescribed breaststroke form must be attained prior to the first armstroke.
 - Breaststroke to freestyle The swimmer must touch as described in Article 101.2.5. Once a legal touch has been made, the swimmer may turn in any manner.
- .4 Finish The swimmer shall have finished the race when any part of the swimmer touches the wall after completion of the prescribed distance.

101.7. RELAYS

- .1 Freestyle Relay Four swimmers on each team, each to swim one-fourth of the prescribed distance using any desired stroke(s). Freestyle finish rules apply.
- .2 Medley Relay Four swimmers on each team, each to swim one-fourth of the prescribed distance continuously in the following order: first, backstroke; second, breaststroke; third, butterfly; and fourth, freestyle. Rules pertaining

to each stroke used shall govern where applicable. At the end of each leg, the finish rule for each stroke applies in each case.

.3 Rules Pertaining to Relay Races

- A No swimmer shall swim more than one leg in any relay event.
- B When automatic relay take-off judging is used, all swimmers must touch the touchplate or pad in their respective lanes at the end of the course to have finished their legs of the relay race.
- C A swimmer other than the first swimmer shall not start until the previous swimmer's leg has been concluded.
- D Any relay team member and his relay team shall be disqualified from a race if a team member other than the swimmer designated to swim that leg jumps into or enters the pool in the area where the race is being conducted and before all swimmers of all teams have finished the race.

Note: An exception may be granted to a relay team member who wishes to enter the water to start from the water; this swimmer shall notify the Starter and be careful not to disturb or interfere with another swimmer or the timing system pad when in use.

E All relay team members shall leave the water immediately upon finishing their legs.

Note: Swimmers who cannot exit the water quickly enough to prevent interference with automatic officiating equipment may be allowed to hold on to the lane line until all relays have finished, allowing them to exit the pool more slowly or via the ladders at the conclusion of the race.

- F Mixed relays shall consist of two men and two women who may swim in any order.
- G Competitors shall be allowed to swim only once per meet in each of the following relays: men's/women's 200 medley, 400 medley, 200 freestyle, 400 freestyle, and 800 freestyle; mixed 200 medley and 400 medley, 200 freestyle, 400 freestyle, and 800 freestyle.
- H The team of a swimmer whose feet have lost touch with the starting platform (ground, deck, or wall) before the preceding teammate touches the wall shall be disqualified.

ARTICLE 102: SWIMMING COMPETITION

102.1. ELIGIBILITY

- . 1 Swimmers 19 years of age and over may register with USMS.
- .2 Those swimmers registered for Masters meets may participate in non-USMS aquatic activities, meetings, exhibitions, demonstrations, etc., without jeopardy to their eligibility to swim in USMS competition. However, any times achieved in non-sanctioned or non-recognized activities will not be recorded

Page 20 PART ONE

for official purposes and cannot be used for LMSC rankings or National Top Ten Times, All-American status, or qualification times for USMS National Championship Meets.

102.2. AGE DETERMINING DATE - The eligibility of a participant for a particular age group will be determined by the age as of the last day of the meet.

102.3. AGE GROUPS

.1 Individual Events - 19-24, 25-29, 30-34, 35-39, 40-44, 45-49, 50-54, 55-59, 60-64, 65-69, 70-74, 75-79, 80-84, 85-89, 90-94, 95-99 ... (five year age groups as high as is necessary).

.2 Relay Events

- A Short course (25 yard) 19+, 25+, 35+, 45+, 55+, 65+, 75+, 85+ ... (ten year increments as high as is necessary). The age of the youngest relay team member shall determine the age group. Relay teams must swim in the oldest age group for which they are eligible.
- B Short course (25 meter) and long course (50 meter) 76-99, 100-119, 120-159, 160-199, 200-239, 240-279, 280-319 ... (forty year increments as high as is necessary). The aggregate age of the four relay team members shall determine the age group.

102.4 WARM-UP/WARM-DOWN

- 1 Availability If there is no other warm-up/warm-down area available in pools of five lanes or more, one lane shall be set aside for warm-up/warm-down during the conduct of the meet. If there is no other warm-up/warm-down area available in pools of four or fewer lanes, swimmers shall be allowed to swim to the other end of the pool at the end of each heat, and a warm-up/warm-down period shall be offered at least once during each half-hour of competition.
- .2 Procedure Swimmers must enter the pool feet first in a cautious manner, with at least one hand in contact with the pool deck or gutter. Diving shall be permitted only from the blocks in the designated lanes.
- 102.5. EVENTS In planning any meet, careful consideration must be given the demands to be made upon swimmers, officials, and spectators, in that order. Meets should be planned to terminate within a reasonable period of time on each day. Planning should provide for adequate meal and rest breaks and sheltered rest areas.

The following events may be conducted for each age group:

.1 Short Course (25 yards)

50-100-200-500-1000-1650 yards Freestyle 50-100-200 yards Backstroke 50-100-200 yards Breaststroke 50-100-200 yards Butterfly 100-200-400 yards Individual Medley

200-400-800 yards Freestyle Relay

200-400-800 yards Mixed Freestyle Relay (2 female and 2 male)

200-400 yards Medley Relay

200-400 yards Mixed Medley Relay (2 female and 2 male)

.2 Long Course (50 meters) and Short Course (25 meters)

50-100-200-400-800-1500 meters Freestyle

50-100-200 meters Backstroke

50-100-200 meters Breaststroke

50-100-200 meters Butterfly

100*-200-400 meters Individual Medley

200-400-800 meters Freestyle Relay

200-400-800 meters Mixed Freestyle Relay (2 female and 2 male)

200-400 meters Medley Relay

200-400 meters Mixed Medley Relay (2 female and 2 male)

* Short Course only

Note: It is not necessary to conduct all of the above events in each meet.

Note: For long distance events, see Article 302.2.

- **102.6. EVENT LIMIT** No swimmer shall be permitted to compete in more than five events per day, exclusive of relays.
- 102.7. ENTRY FEES Entry fees for local Masters events shall be set by the LMSC.
- 102.8. SCRATCH PROCEDURES Each swimmer shall inform himself of the meet starting time and shall report to the proper meet authorities promptly upon call. Meet announcements and advance information shall specify check-in and scratch procedures for individual and relay events.
- .1 Penalties Any swimmer or relay team not reporting for or competing in an event shall not be penalized.

102.9. RELAYS

- .1 Relay teams may not compete unattached. In all cases, relay teams must be composed of USMS members of the same club, which is a member of the Corporation.
- .2 Clubs entering two or more relay teams in an event shall designate them on the entry blank as Team A, Team B, etc.
- .3 The best time or aggregate time of each relay team shall be entered on the entry blank for seeding purposes, and no change in time shall be permitted.
- .4 On the relay card, relay teams must list the name of the registered swim club, the full name (as it appears on the USMS registration card), the age, and for mixed relays the sex of each relay member. The name of the lead-off swimmer must be clearly designated.

Page 22 PART ONE

- .5 First and last names of competing relay swimmers, their ages, and their order of swimming shall be declared to the clerk of course (if used) or to the head lane timer immediately prior to the start of the relay heat in which such team is entered. No changes will be permitted thereafter.
- .6 The competing teams, first and last names of members, and their ages must be listed in the meet results.

102.10. LANE ASSIGNMENTS - SEEDING - COUNTERS

- .1 Seeding Principles for Masters Competition
 - A All Masters events shall be conducted on a timed final basis.
 - B Age groups, sexes, and events of the same distance 200 yards or longer may be combined so that no swimmer has to swim alone and lanes may be filled.
 - C It is recommended that when swimmers are seeded by time and not by age groups, the fastest two swimmers in each age group should not be seeded into outside lanes. It is recommended that they be moved inward one lane or given the center lane in the next slowest heat, whichever is the more appropriate placement.
 - D Seeding at meets other than National Championship Meets may be either fast-to-slow or slow-to-fast. Seeding may differ for sprint and distance events (events 400 yards or longer) within a meet. Women's and men's heats may be alternated in the distance events. The meet announcement shall state the seeding for all events.
 - E Heat and lane assignments for events of 200 meters or less shall be available to all competitors at least five minutes prior to the start of the event.

.2 Heat and Lane Assignments

A Seeding within heats - Within each heat, lanes shall be assigned in order of submitted times (fastest to slowest) in accordance with the following pattern:

Ten Lanes: 5-6-4-7-3-8-2-9-1-10
Nine Lanes: 5-4-6-3-7-2-8-1-9
Eight Lanes: 4-5-3-6-2-7-1-8
Seven Lanes: 4-3-5-2-6-1-7
Six Lanes: 3-4-2-5-1-6
Five Lanes: 3-2-4-1-5
Four Lanes: 2-3-1-4

B Minimum number of swimmers per heat - There shall be a minimum of three swimmers per heat whenever three or more swimmers have entered an event. The fastest heat shall be filled first, then the next fastest heat, etc.

- C Fast-to-slow seeding The first heat of each event shall be composed of the swimmers with the fastest submitted times, the second heat composed of the next fastest swimmers, etc.
- D Slow-to-fast seeding The last heat of each event shall be composed of the swimmers with the fastest submitted times, the next-tolast heat composed of the next fastest swimmers, etc.

.3 Seeding of Events in a 50-Meter Course

- A Lane numbers Lanes shall be numbered at the starting end of the pool in accordance with Article 107.4.3. If the event is started at the turning end of the course, no change in the lane numbering shall be made; i.e., the lanes shall be numbered the same on both ends of the course.
- B Starting 50-meter events from the turning end of the course When the course depth permits, 50-meter events may be started from the turning end of the course.
- C Starting men's and women's events from alternate ends of the course - If only one course is available and pool depth is adequate at both ends of the course, the meet director may choose to start men's events at one end of the course and women's events at the alternate end of the course.
 - 1. Men's and women's heats shall alternate.
 - 2. In 50-meter events, the in-the-water heat may be instructed to wait in the water after the finish until the next heat has been started.
 - 3. In events 100 meters and longer, the next heat may be started when the in-the-water heat is within a half-length of the finish.

.4 Two-to-a-Lane Seeding in Distance Freestyle Events

A General principles of seeding two-to-a-lane

1. Options to swim two-to-a-lane

- a. At the discretion of the meet director, competitors in the freestyle events over 200 meters may be required to swim twoto-a-lane when only one course is available for the event. The meet announcement shall state the criteria under which such events are to be swum two-to-a-lane.
- b. When competitors have an option of swimming two-to-a-lane, the heats with two competitors per lane will be completed before the heats with a single competitor per lane.
- c. If, in the slowest/fastest heat, there are not enough swimmers to fill the lanes with two swimmers each, those swimmers may be seeded one-to-a-lane.

2. Men's/Women's events

- If men and women compete under the same event number, they shall be seeded by time without regard to sex.
- b. If men and women compete under different event numbers, they shall be seeded separately by time.
- If men and women compete under different event numbers, men's and women's heats should be alternated.
- 3. Heat designations Heats shall be numbered consecutively without using alphabetical characters (i.e., no "A" and "B" heats). Heats shall be referred to as "odd" or "even" numbered heats. Odd and even heats shall be paired when seeding two-to-a-lane.
- 4. Reporting to the clerk of course Swimmers in both odd and even heats shall be asked to report to the clerk of course (or to the starting area) at the same time.
- 5. Starting procedure The Starter shall call the odd heat to the starting block first. As soon as the odd heat is underway, swimmers in the even heat shall be called to the starting blocks. The even heat shall be started as soon as practical after the odd heat.

6. Lane etiquette

- The Starter shall instruct the swimmers to swim on one side of the lane during the entire race (i.e., no "circle" swimming).
- b. Obstructing another swimmer by swimming across or otherwise interfering shall disqualify the offender, subject to the discretion of the Referee, and the disqualified offender shall immediately be removed from the lane.
- 7. Timing Separate timing will be required for each swimmer.
- B Methods of seeding two-to-a-lane (either method is recommended)
 - 1. Swimmers of similar speed in the same heat
 - a. Heat and lane assignments Lanes shall be assigned as in Article 102.10.2
 - b. Pairing of heats After lanes are assigned, heats shall be arranged in pairs beginning with either the slowest or fastest heats at the meet director's discretion. The fastest heat within each pair shall be designated as the odd heat and the nextfastest heat as the even heat.

In the following example, for a 6-lane pool, "1" refers to the fastest swimmer, "2" to the next-fastest swimmer, etc.

Lane						
Heat	L1	L2	L3	L4	L5	L6
Odd heat	5	3	1	2	4	6
Even heat	11	9	7	8	10	12

2. Swimmers of similar speed in the same lane - Create groups of swimmers equal in number to twice the number of lanes of the pool (e.g., groups of 12 swimmers for a 6-lane pool). Each group of swimmers shall be divided into odd and even heats. The fastest swimmer in each group shall be assigned to a middle lane in the odd heat. The second-fastest swimmer shall be assigned to a middle lane in the even heat. The remaining swimmers shall be assigned to lanes in accordance with Article 102.10.2A.

In the following example, for a 6-lane pool, "1" refers to the fastest swimmer, "2" to the next-fastest swimmer, etc.

	Lane					
Heat	L1	L2	L3	L4	L5	L6
Odd heat	9	5	1	3	7	11
Even heat	10	6	2	4	8	12

.5 Places - Places shall be determined on a time basis, subject to the order of finish within each heat. Any ties resulting from the procedure used shall be declared officially tied for awards and points, with no further attempt at resolution.

.6 Counters

- A swimmer in any individual swimming event of 400 yards or meters or more, except the individual medley, may appoint one counter to call lengths or indicate lengths by visual sign.
- B Verbal counters shall be limited to one per swimmer and shall be stationed at the end of the course opposite the starting end. They may use watches and signal intermediate times to the swimmer.
- C If visual counters are used, they may be stationed at the end or either side of the pool, beyond the halfway point toward the end of the course opposite the starting end. Visual counters may be lowered into the water at the end of the swimmer's lane, provided that, in the opinion of the Referee, they neither physically aid the swimmer or interfere with another competitor or present any safety hazard.
- D The count may be in ascending or descending order.
- E In the event of official or counter error, it is the responsibility of the swimmer to complete the prescribed distance.

Page 26 PART ONE

- 102.11. AWARDS When two or more swimmers tie for any place, duplicate awards shall be given to each swimmer. In such cases, no awards shall be given for the place or places immediately following the tied positions. If two tie for 1st place, no award for 2nd place; if three tie for 1st place, no awards for 2nd and 3rd, and so on.
- **102.12. SCORING** Article 102.12 is recommended for all Masters Swimming competition.

.1 Dual Meets

Individual events: 5-3-1-0
Relay events: 7-0

.2 Triangular Meets

Individual events: 6-4-3-2-1-0 Relay events: 8-4-0

.3 Other Meets

Individual events:

4-lane pools: 5-3-2-1
5-lane pools: 6-4-3-2-1
6-lane pools: 7-5-4-3-2-1
7-lane pools: 8-6-5-4-3-2-1
8-lane pools: 9-7-6-5-4-3-2-1
9-lane pools: 10-8-7-6-5-4-3-2-1
10-lane pools: 11-9-8-7-6-5-4-3-2-1

Individual point values shall be doubled for relays.

- .4 Ties Where two or more swimmers tie for any place in any event, the points credited to such place or places, if any, shall be equally divided among the swimmers; i.e., if two tie for first place, the points to be credited to first and second place shall be added and divided by two. Each tying swimmer will receive half of the total points for first and second places. If three tie for first place, the points credited to first, second, and third places shall be added and divided by three, and so on for four or more tying for first place. The same is true for those tying for second place, third place, and whatever places there may be.
- .5 Disqualifications When a relay team or individual swimmer is disqualified, the following places will move up accordingly and points awarded to conform to the new places.

102.13. CHANGE OF PROGRAM AND POSTPONEMENT

.1 The order of events, as laid down in the official program, shall not be changed. The announced arrangement of heats in any event shall not be added to or altered, except by the authority of the Referee to the extent of consolidating the heats. .2 The entry provisions and starting time of any event, meet, or portion thereof shall stand as stated on the entry blank (except as permitted in Article 102.13.3) and may not be changed to an earlier time or date unless written notice of such change is delivered all affected swimmers or their coaches. If mailed, such notice must be postmarked no later than the entry deadline date stated on the entry blank, and if lack of time prohibits mail notification, all affected swimmers must voluntarily agree in writing that they have been notified and are in accord with such change. Any affected swimmer or his coach may and should file a written protest with the Referee prior to the running of the event or the meet if the swimmer or his coach does not agree to such change in time or date.

.3 Postponement or Cancellation

- A If, prior to the start of a meet or event, unusual or severe weather or other conditions preclude the possibility of safely and effectively conducting a meet or event, the meet committee may cancel or postpone it.
- B Should a meet or event have actually commenced, and in the judgment of the Referee cannot safely and effectively continue because of weather conditions or for some other compelling reason, the meet or event may be suspended at the Referee's sole discretion until conditions warrant continuance. If conditions do not warrant continuance, the Referee may cancel the meet or postpone it to a future date or time, with the approval of the meet committee.
- C A decision to cancel or postpone shall be final.
- D Should an event have actually commenced but be terminated prior to an official finish, and be postponed to another time or date, it shall then be conducted among the swimmers who were officially competing in the event at the time of termination.
- Entry fees for teams or swimmers may be refunded, in whole or part, at the discretion of the meet committee, upon cancellation of a meet or particular event. The decision of the meet committee on refunding may be appealed to the Officers of the LMSC (local or regional meets) or the USMS Championship Committee (National Championship Meets).

102.14. COSTUME

- .1 Design Swimmers' costumes must be non-transparent and conform to the current concept of the appropriate. The Referee shall have authority to bar offenders from competition under this rule until they appear properly costumed.
- .2 Advertising Products involving tobacco, alcohol, or pharmaceuticals containing drugs banned under IOC or FINA rules may not be advertised, but the advertiser's name only may be used.

102.15. DISQUALIFICATIONS

.1 A disqualification can be made only by the official within whose jurisdiction the infraction has been committed.

Page 28 PART ONE

- .2 Any swimmer who acts in an unsportsmanlike or unsafe manner within the swimming venue may be considered for appropriate action or penalty at the discretion of the Referee.
- .3 Swimmers must start and finish the race in their assigned lane.
- .4 Standing on the bottom during a freestyle race shall not disqualify swimmers, but they must not leave the pool, or walk, or spring from the bottom. Standing on the bottom during any other stroke shall result in disqualification.
- . 5 Obstructing another swimmer by swimming across or otherwise interfering shall disqualify the offender, subject to the discretion of the Referee.
- .6 Dipping goggles in the water or splashing water on the competitor's face or body prior to the event shall not be considered as entering the pool unless the Referee finds that such action is interfering with the competition.
- .7 Should a foul endanger the chance of success of a swimmer, the Referee may order the heat reswum, or allow the competitor to swim in a later heat. In the case of collusion to foul another swimmer, the Referee may, at his discretion, disqualify the swimmer for whose aid the foul was committed, as well as the swimmer doing the fouling.
- .8 No swimmer is permitted to wear or use any device or substance to help his speed or buoyancy during a race. Goggles may be worn and rubdown oil applied if not considered excessive by the Referee.
- . 9 Grasping the lane line to assist forward motion is not permitted.
- .10 For relay disqualifications, refer to Article 101.7.3.
- .11 The time, place, and/or initial splits of any swimmer or relay team disqualified either during or following an event shall not be recorded in the results of that event. If awards have been made prior to the decision to disqualify, they shall be returned and made to the proper recipient(s), and if points have been scored by those disqualified the event shall be rescored.
- .12 Time and/or place officially recorded for a swimmer shall not be nullified for violations occurring subsequent to such performance.

102.16, PROTESTS

- .1 Until final action is determined, results of any race conducted under protest, or of any protested race, shall not be announced and no awards for that race shall be presented or scoring of points allowed unless the protest is officially withdrawn.
- .2 Protests affecting the eligibility of any swimmer to compete or to represent an organization in any race shall be made in writing to the meet director or Referee before the race is held, and if the meet committee deems it advisable, the swimmer may compete under protest and it shall be so announced before the race. The meet committee shall immediately refer such protest to the LMSC officers (local meets) or Championship Meet Protest Committee (National

Championship Meets; see Article 104.5.9B) having jurisdiction for adjudication at the earliest possible time.

- .3 Protests against judgment decisions of Starters, stroke, turn, and relay takeoff judges can only be considered by the Referee of the meet.
- .4 Any other protest arising from the competition itself shall be made within 30 minutes after the race in which the alleged infraction took place. If the protest is not resolved immediately, the protester shall at that time file a written protest with the chairman of the LMSC or the chairman's representative having jurisdiction over the event. If the LMSC does not satisfactorily resolve the protest within ten (10) days, the protestor may appeal in writing to the USMS Rules Committee Chairman within the next five (5) days for final adjudication, whose decision shall then be binding on all parties.

102.17, REQUIRED OFFICIALS

- .1 All officials accepting an invitation to officiate at a swimming meet should arrive promptly and report immediately to the meet director or meet referee.
- .2 The minimum number of officials at USMS sanctioned Masters Swimming meets or recognized events shall include the following:
 - 1 Referee
 - 1 Starter
 - 2 Stroke and Turn Judges
 - 2 Timers per lane (if automatic timing is not being used)

The Referee and Starter may double as stroke and turn judges, but the Referee and Starter may not be the same person. One of the officials shall be a Referee, Starter, or stroke and turn judge certified by USS, YMCA, or any other USMS-approved certifying body.

- .3 When automatic officiating equipment is used in any competition, the placings and times so determined shall have precedence over the decisions of human judges and timers, as outlined in Article 103.7.4. In case of malfunction, secondary information from a semi-automatic timing and judging device with one or more officials per lane shall be used and integrated with primary information.
- 102.18. MEET DIRECTOR Appointed by the meet sponsor. Responsibilities include, but are not limited to: ordering awards; obtaining sanction; preparation of facility; arranging for personnel, equipment, and supplies necessary for meet operation; processing of entries; printing of programs; arranging for appropriate publicity and media coverage; preparing and distributing summary of results 14 days after meet; and filing of LMSC report.
- 102.19. MEET COMMITTEE The committee consists of a minimum of the Meet Director, Referee or Starter, and a participating athlete as appointed by the Meet Director prior to the start of the meet.

102.20. SMOKING - No smoking indoors or outdoors shall be permitted in any area designated for swimmers, including spectator seating, standing, and eating areas used by swimmers during the meet and during the warm-up periods in connection with the meet.

ARTICLE 103: OFFICIALS AND THEIR DUTIES

103.1. REFEREE

- .1 The Referee shall have full authority over all officials and shall assign and instruct them; shall enforce all applicable rules and shall decide all questions relating to the actual conduct of the meet, the final settlement of which is not otherwise assigned by said rules; can overrule any meet official on a point of rule interpretation or on a judgment decision pertaining to an action which has been personally observed; shall also disqualify a swimmer(s) for any violations of the rules that have been personally observed and shall at the same time raise one hand overhead with open palm. If no signal is made, there shall be no penalty. The Referee or designated official making a disqualification shall make every reasonable effort to seek out the swimmer and/or the swimmer's coach and inform them of the reason for the disqualification.
- .2 The Referee shall signal the Starter before each race that all officials are in position, that the course is clear, and that the competition can begin; shall assign marshals with specific instructions.
- .3 The Referee shall give a decision on any point where the opinions of the judges differ; shall have authority to intercede in a competition at any stage to ensure that the racing conditions are observed.
- .4 When automatic or semi-automatic officiating equipment is used and an apparent malfunction occurs, it shall be the Referee's responsibility to make an immediate investigation to determine whether the swimmer finished in accordance with the rules and/or if there was an actual equipment malfunction.
- .5 The Referee may prohibit the use of any bell, siren, horn, or other artificial noisemaker during the meet.
- .6 The Referee may modify any rule for a swimmer who has a disability identified in Appendix G, USMS Adapted Swimming Guidelines. Such modification shall be based on recommendations of the National Sports Organizations for the identified disability. It shall be the responsibility of the swimmer or representative to notify the Referee of the disability prior to competition.
- .7 When the meet sanction allows conducting events from alternate ends of a 50-meter course or conducting freestyle events longer than 200 meters two-to-a-lane, the Referee shall establish the necessary administrative and officiating procedures to conform to Article 102.10.
- .8 Refer to Article 102.16 concerning protests.

103.2. STARTER

.1 Preparation

- A An electronic starting horn, with or without an underwater recall device, and an electronic strobe signal is the preferred starting device. A gun of at least .22 caliber may be used.
- B The Starter shall be stationed within ten (10) feet of the starting end of the pool. The visual starting signal shall be clearly visible to all swimmers and timers and the starting signal shall be audible to all the starting positions.
- C Upon signal from the Referee, the Starter assumes full control of swimmers until a fair start has been achieved.
- D The Starter notifies the swimmers of the distance and the event.
- E Optional instructions
 - 1. Stroke(s) to be used and the order of swimming them.
 - Number of pool lengths to be swum.
 - Advise heat when a swimmer is attempting a time at an initial distance.
 - 4. For backstroke starts, the command, "Place your feet."
 - 5. Notify relay swimmers that all but the last swimmer must leave the pool immediately upon completion of their legs. Swimmers who cannot exit the water quickly enough to prevent interference with automatic officiating equipment may be allowed to hold on to the lane line until all relays have finished, allowing them to exit the pool more slowly or via the ladders at the conclusion of the race.

.2 Starts (see Article 101.1)

.3 Starting Commands

- A After the Referee's whistle, the Starter directs swimmers to "Take your mark," to which they must respond at once by assuming a starting position. Sufficient time should follow the direction, "Take your mark," to enable swimmers to assume a starting position, but no swimmer shall be in motion immediately before the starting signal is given.
- B When all swimmers are motionless in the starting position, the Starter gives the starting signal.
- .4 Warning Signal In all events 500 yards or longer except relays, the Starter or a designee shall sound a warning signal over the water at the finish end of the lane of the leading swimmer when that swimmer has two lengths plus five yards (or meters) to swim.

.5 False Starts

A When a swimmer does not respond promptly to the command, "Take your mark" or false starts before the starting signal is given, the Starter shall

Page 32 PART ONE

immediately release all swimmers with the command, "Stand up," upon which the swimmers may stand up or step off the blocks. Any swimmer who enters the water or any backstroker who leaves the starting area shall be charged with a false start, except that a swimmer who would otherwise be charged with the false start may be relieved of the charge if the false start was caused by the swimmer's reaction to the command.

- B All swimmers leaving their marks before the starting signal is given shall be charged with a false start, except that a swimmer who has false started because of the action or movement of another competitor may be relieved of the responsibility for the false start and a false start may be charged only to the offender. (Note exception for deliberate delay or misconduct in Article 103.2.6.)
- C In backstroke or medley relay events, a false start may be charged to any swimmer who fails to maintain the feet and/or hands in a legal position after the first warning.
- D When the starting signal is given and one or more swimmers have obtained an unfair advantage, all swimmers shall be recalled at once by a second signal.
- E A swimmer can be charged with a false start by the Starter or recall starter only if the Referee or an officially designated Assistant Referee has observed the violation and confirms that the violation occurred.
- F The Starter shall indicate the swimmer or swimmers, if any, who are charged with a false start.
- G Any swimmer who is charged with committing or causing a false start shall be disqualified and shall not be permitted to swim the event. This rule shall not apply to USMS international events, the Pan Pacific Aquatic Games, or FINA World Championships, where current FINA false start rules shall apply.
- A swimmer shall not be disqualified for an illegal starting position at the start or charged with a false start if the race is permitted to proceed without recall. Enforcement of the correct starting position is the responsibility of the Starter, who may impose the appropriate penalty for violation before the starting signal is given.

.6 Deliberate Delay or Misconduct

- A Any swimmer who delays the start by entering the water or by willfully or deliberately disobeying a Starter's command to step on the blocks or to take a starting position, or takes part in any other misconduct at the start, can be disqualified from the event by the Starter with concurrence of the Referee.
- B A swimmer who fails to appear at the starting platform ready to swim in time for the initial start of the swimmer's heat shall be disqualified by the Referee.

- 103.3. RECALL STARTER A Recall Starter may be assigned to immediately discharge a recall sound device if the automatic equipment is not properly functioning on the starting signal or if a false start has been observed. The position of the Recall Starter and the type of signal to be used shall be made known to the swimmers. The Recall Starter may also be assigned to assist the Starter in any desired manner.
- 103.4 RECALL ROPE OPERATOR The duty of the Recall Rope Operator shall be to immediately, upon sounding of the false start signal, activate the quick release mechanism of the recall rope so that the recall rope drops across the course before any swimmer has swum approximately 11 meters (36 feet) from the starting end in short course and 15 meters (49 feet) in long course. If the recall rope is equipped in such a way as to allow the Recall Starter to operate the quick release mechanism from his position immediately upon sounding of the false start signal (see 107.15), the duties of the Recall Rope Operator and the Recall Starter may be combined.
- 103.5. JUDGES Shall have jurisdiction over the swimmers immediately after the race has begun.
- .1 Chief An overall "Chief Judge" may assign and supervise the activities of all stroke, turn, and take-off judges and may report their decisions, or, if desired, any judging category may have a designated "Chief." Any "Chief" may act as liaison for the judges and may serve simultaneously in one of the judging positions, and shall assign those judges within the category.
- .2 Stroke Judges Shall operate on both sides of the pool, preferably walking abreast of the swimmers during all strokes except freestyle, during which events they may leave poolside, at the Referee's discretion; shall ensure that the rules relating to the style of swimming designated for the event are being observed; and shall report any violations to the Referee on signed slips detailing the event, the heat number, the lane number, the swimmer's name, and the infraction observed.
- .3 Turn Judges Shall operate on both ends of the pool; shall ensure that when turning or finishing the swimmer complies with the turning and finishing rules applicable to the stroke used; and shall report any violations to the Referee on signed slips detailing the event, the heat number, the lane number, the swimmer's name, and the infraction observed.
- .4 Jurisdiction of Stroke and Turn Judges Before the competition begins, the Referee shall determine the respective areas of stroke and turn responsibility and jurisdiction, which may include joint, concurrent, and coordinated responsibility and jurisdiction. The Referee shall insure that all swimmers shall have fair, equitable, and uniform conditions of judging.

.5 Relay Take-Off Judges

A After the start of the race, relay take-off judges shall stand beside the starting block of each lane so that they can clearly see both the touch of the incoming swimmer and the feet of the departing swimmer as they

Page 34 PART ONE

leave the starting platform in that lane, and shall judge whether the swimmer is in contact with the platform when the incoming swimmer touches the end of the pool.

- B Additional relay take-off judges may be assigned to each side of the course to observe two assigned lanes each, in which case a relay will be disqualified only if the lane take-off judge has reported an infraction and the assigned poolside take-off judge has confirmed the same infraction. If dual relay take-off judging is used, the lane and poolside take-off judges shall independently report infractions in writing without the use of infraction hand signal. If poolside relay take-off judges are used, they shall be assigned for all relay races throughout the meet.
- When automatic relay take-off judging equipment is available and in use, take-off judges will be assigned to each lane and stationed as described above. A team will be disqualified only when there is dual confirmation of an illegal take-off (i.e., visual and automatic equipment).
- .6 Infraction Signal The Referee, stroke, turn, or relay take-off judge shall immediately raise one hand overhead with open palm upon observing an infraction within their jurisdiction. If the official does not do so, there shall be no disqualification.

Exception: Relay take-off judges as outlined in Article 103.5.5B.

103.6. TIMERS

- . 1 Chief Timer The Chief Timer shall:
 - A Assure the assignment of Lane Timers to lanes and the designation of one timer on each lane to be the Head Lane Timer.
 - B On the starting signal, start a watch(es) on every race. The time of this watch shall be used if a Lane Timer's watch fails.
 - C Be responsible for delivering all manual watch times, including those of disqualified swimmers, to the Timing Judge.
- .2 Head Lane Timer The Head Lane Timer shall:
 - A Determine whether the swimmer or relay team is present and in the correct lane, heat, and event, and that relay swimmers are swimming in the order listed.
 - B Determine and record manual watch times or the absence of a swimmer or the relay team seeded in that lane.
 - C Assign one timer to take relay splits and initial distance times if requested by the Chief Timer.
 - D Determine and report if the swimmer has delayed in touching or has missed the touch pad at the finish.
- .3 Lane Timers Officials assigned as Lane Timers may simultaneously operate two dissimilar devices (one watch and one button) but not two similar

devices (two watches or two buttons). It is not within a Lane Timer's jurisdiction to judge if the swimmer's touch conforms to the applicable finish rules or if a relay take-off infraction has occurred unless assigned concurrent responsibility as a Lane Timer and Turn Judge or Relay Take-off Judge. Each timer shall:

- A Be in position at the start to have an unobstructed view and shall start the watch at the instant of observing the visual starting signal. If neither is observed, the watch shall be started upon hearing the sound of the horn or gun.
- B Stand directly over the assigned lane at the finish to observe a touch above, at, or below the surface of the water and stop the watch and/or push the semi-automatic system button when any part of the swimmer's body touches the wall.
- C Report the watch time to the Head Lane Timer or the designated recorder; report if a late or missed pad touch is observed; and, if requested, present the watch for inspection. Lane Timers shall not clear their watches until a command to "clear watches" is given or the Referee signals that the next heat is ready to start.
- .4 Timing Equipment Operator The Timing Equipment Operator shall be responsible for the automatic or semi-automatic timing equipment, including the electronic starting system and scoreboard (if used), and shall advise the Referee of any system problems that might affect the accuracy of times or whenever the touchpad is observed to have failed to record the finish when the swimmer completed the race.
- .5 Timing Judge Under the direction of the Referee, the Timing Judge shall determine the official time for each swimmer as follows:
 - A Receive and review the automatic and/or semi-automatic timing results from the Timing Equipment Operator and compare primary timing results with the back-up timing results to determine their validity.
 - B Receive the times recorded by the Head Lane Timers from the Chief Timer and use those times to the extent needed to determine the official time for each swimmer.
 - C Notify the Referee whenever a time obtained by the primary timing system cannot be used as the Official Time.
 - D Record disqualifications approved by the Referee. A written record of all disqualifications signed by the Referee shall be given to the Recorder.
- .6 Recorder There shall be two recorders and the number of assistants deemed necessary to receive and record all times and all disqualifications for each event and to furnish all pertinent information to the recorder of records, scorers, press, TV, announcer, and meet secretary. The Recorder shall:
 - A Record the Official Times and disqualifications.
 - B Determine the official order of finish.

Page 36 PART ONE

- C Results of each event by sex and USMS age group shall be posted or otherwise made available to the competitors as promptly as possible after the completion of each event.
- D Determine the score of the meet (optional).

103.7. TIMING EQUIPMENT

.1 Timing Systems

- A Automatic A timing system that is started by an electric impulse generated by a starting device or a transducer capable of detecting a gun report and is stopped at the finish by the swimmer touching the touchpad.
- B Semi-Automatic A timing system that is started by an electric impulse generated by a starting device or transducer capable of detecting a gun report and is stopped by buttons pushed by timers at the finish touch of the swimmer.
- C Manual A timing system consisting of individual lane timers, each of whom operates a manual watch that is both started and stopped by the timer as described in Article 103.6.3. Only digital read-out type hand-held battery powered watches designed for timing purposes shall be used.
- .2 Timing System Designation Timing systems shall be designated in the order in which results are used as follows:
 - A Primary System The primary system shall determine the official time of each swimmer unless a comparison of the primary with secondary and/or tertiary system times indicates a malfunction of the primary system. A primary system shall always be in place and shall consist of one of the following, listed in their preferred order of use:
 - Automatic Timing
 - 2. Semi-Automatic, with three or two buttons per lane, each operated by a separate timer.
 - Manual, with three or two watches per lane, each operated by a separate timer.
 - B Secondary System If manually operated watches are not the primary system, a secondary system of precedence equal to or lower than the primary system shall be used. The secondary system may be:
 - Semi-automatic with one, two, or three buttons, each operated by a separate timer.
 - Manual with one, two, or three watches per lane, each operated by a separate timer.
 - C Tertiary System Unless the primary system consists of manual watches or the secondary system includes at least one manual watch per lane, a tertiary system of at least one manual watch per lane shall be provided.

.3 Timing Resolution (Timing Accuracy) - All timing systems, including manual watches, shall have a resolution of one one-hundredth of a second (0.01 second). Times from all systems shall be recorded to hundredths of a second. The digits representing thousandths shall be dropped with no rounding.

4 Determination of Official Time

- A Automatic Timing When recorded by properly operating automatic timing equipment, the pad time shall be the official time.
- B Semi-Automatic and Manual Timing Whenever semi-automatic or manual timing is used, the times shall be determined as follows:
 - If two of the three button or watch times agree, that shall be the time for that timing system.
 - 2. If all three buttons or watches disagree, the time of the intermediate button or watch shall be the time for that timing system.
 - 3. If only two button or watch times are available, the time shall be the average of those two button or watch times. The digits representing thousandths of a second shall be dropped with no rounding.
 - 4. If only one button or watch time is available, the time of that button or watch shall be the time for that timing system.
- C Primary Timing System Malfunction A primary timing system malfunction may have occurred if:
 - 1. The difference between the time obtained by the primary system and the back-up system(s) is more than 0.30 second.
 - 2. A late or missed touch is reported by an official observing the finish.
- D Adjustment for the Timing System Difference When the Referee determines that there is a malfunction of the primary timing system, the back-up time(s) shall be adjusted for the timing system difference prior to integrating them with accurate primary times in establishing the official times and determining the order of finish. The adjustment for timing system difference may be incorporated into the automatic or semi-automatic system by design or may be determined by calculating the consistent average difference between the primary and back-up systems used at that meet.
- E Adjustment for Malfunction on a Lane When a malfunction is confirmed on a lane, the back-up times for that lane shall be adjusted by calculating the average difference between valid primary and valid back-up times of the other lanes in that heat. This shall be done by adding, or subtracting when appropriate, that average difference to the valid back-up time of the lane where the malfunction occurred.

EXAMPLE (LANE MALFUNCTION):

Systems used:

Primary - Automatic

Secondary - Semi-automatic, three buttons (intermediate button time shown in **bold**)

Tertiary - Manual, one watch

LANE	PRIMARY	BUTTON	BUTTON	BUTTON	WATCH	PAD MINUS	OFFICIAL
	PAD TIME	A	В	С	TIME	MIDDLE	TIME
						BUTTON	
1	52.21	52.07	52.12	52.14	52.04	.09	52.21
2	52.18	52.01	51.91	52.06	51.95	.17	52.18
3	51.05	51.01	50.97	51.00	50.95	.05	51.05
4	51.04	50.78	50.88	50.93	50.84	.16	51.04
5	51.96	51.30	51.35	51.38	51.27	.61*	51.46**
6	51.65	51.57	51.56	51.59	51.55	.08	51.65
7	52.27	52.13	52.18	52.13	52.10	.14	52.27
8	51.87	51.58	51.75	51.89	51.65	.12	51.87

^{*}More than 0.30 of a second difference, late touch confirmed.

**Adjustment calculation: Add the differences between pad and intermediate button time, excluding the malfunctioning lane (total = .81). Divide total by the number of valid lanes to determine the average (.81 divided by 7 = .11571). The digits after hundredths are dropped (leaving a timing system difference of .11 for the above example). Add the timing system difference to the valid back-up time for the malfunctioning lane (51.35 + .11 = 51.46, the official time for Lane 5).

F Adjustment for Malfunction Equally Affecting an Entire Heat - When, because of an early or late start, or other equipment or operator malfunction, the time of the automatic or semi-automatic primary timing system is equally incorrect for all lanes in a heat, but the order of finish and thus the absolute difference of time between the swimmers is accurate, the average difference between the primary times and the valid back-up times is added, or subtracted when appropriate, to the primary times of every lane in that heat.

EXAMPLE (HEAT MALFUNCTION):

Systems used:

Primary - Automatic (late manual start confirmed)

Secondary - Semi-automatic, three buttons (button times not valid)

Tertiary - Manual, one watch (valid)

LANE	PRIMARY PAD TIME	WATCH	WATCH TIME LESS PAD	HEAT ADJUSTMENT	OFFICIAL TIME
	PADIME	I HAIT	TIME	ADSOSTMENT	IIMC
1	52.12	55.14	3.02	+ 3.06	55.18
2	51.56	54.61	3.05	+ 3.06	54.62
3	51.09	54.18	3.09	+ 3.06	54.15
4	50.12	53.18	3.06	+ 3.06	53.18
5	49.78	52.90	3.12	+ 3.06	52.84
6	49.06	52.06	3.00	+ 3.06	52.12
7	52.21	55.30	3.09	+ 3.06	55.27
8	52.92	55.99	3.07	+ 3.06	55.98

Adjustment calculation: Add the differences between the pad and watch times (total = 24.50). Divide the total by the number of lanes to determine an average (24.50 divided by 8 = 3.0625). The digits after hundredths are dropped (leaving a heat adjustment of 3.06). Add the adjustment factor for the late start of the primary system to each pad time to obtain the official time for that lane (e.q., Lane 1:52.12 + 3.06 = 55.18).

103.8. OFFICIAL TIME

- .1 An official time shall be achieved in a USMS sanctioned competition or recognized event in accordance with all applicable rules. It may be achieved in:
 - A A timed final heat.
 - B A split time recorded for an initial distance within a longer event, provided the swimmer completes the event without being disqualified.
- .2 An official time for any swimming event can be achieved only in the relevant stroke/event (e.g., backstroke time must be achieved in a backstroke event). A time achieved in a freestyle event can only be recorded as a freestyle time regardless of the stroke used.
- .3 The official time to establish records and Top Ten Times can be achieved only in accordance with the following timing methods:

Timing Method	0	fficial Time Level
Automatic timing	-	World Records, USMS National Records, and USMS Top Ten Times Initial splits for all purposes Relay lead-off times for World Records only
Three watches or semi-automatic with three buttons	-	World Records, USMS National Records Initial splits and relay lead-off times for World records only
Two watches or semi- automatic with two buttons	-	USMS Top Ten Times

- . 4 World records may be established when timed by three watches.
- .5 Except when the primary system consists of watches, backup timing shall be provided for all competitors. No swimmer shall be required to reswim a race due to equipment failure which results in unrecorded or inaccurate time or place. It is the meet director's responsibility to provide the proper timing systems so that swimmers can expect to achieve official times that will satisfy the above requirements.
- .6 A backup time adjusted for system timing errors in accordance with the methods described in Article 103.10.4 may be used as an official time equal to the level of the timing system to which it has been adjusted.
- .7 Secondary and tertiary times shall be recorded but shall not be used except to corroborate or correct missing or inaccurate primary/secondary results.

103.9. CLERK OF COURSE

- .1 The clerk of course shall be provided with an area clearly marked "Clerk of Course" where all swimmers must report as soon as their event is called.
- .2 The clerk of course shall be provided with a list of the names of all swimmers in all events including relay swimmers in the order in which they will swim.
- .3 All scratches which have occurred after the printing of the heat sheet shall be reported to the clerk of course. The clerk of course shall notify the Referee and scoring desk of any changes to the seeding of an event.
- .4 The clerk of course shall instruct the swimmers to wait behind or adjacent to the starting area until the Starter takes over control of the race, and if they leave the area it will be their responsibility to return in time for their heat or event.
- 103.10. MARSHALS Shall enforce warm-up procedures and maintain order in the swimming venue. The marshal shall have full authority to warn or order to cease and desist, and, with the concurrence of the Referee, to remove, or have removed from the swimming venue anyone behaving in an unsafe manner or using profane or abusive language, or whose actions are disrupting the orderly conduct of the meet.
- 103.11. ANNOUNCER The announcer shall announce, before the start of each event, the event name and number of heats. At the start of each heat the lane, the name of each swimmer, and club affiliation (if any) may be announced. Other announcements shall be made as requested by the Referee, the clerk, or the management.
- 103.12. RECORDER OF RECORDS Shall obtain from the official recorder all times made in each event, shall have proper application forms, and shall duly process all record claims as set forth in Article 105.

103.13. PRESS STEWARD - The press steward shall obtain from the clerk of course and the recorders the names of all swimmers in each event and the results of each finish with times or record performances, and he shall keep the press and TV personnel thoroughly informed on all details of the competition during the meet.

ARTICLE 104: NATIONAL CHAMPIONSHIP MEETS

(Recommended for all Championship Meets when possible)

- 104.1. MEET CATEGORIES USMS National Championship Meets shall be awarded in the following categories:
- .1 Short Course National Championship Meet Dates The short course (25 yards) National Championship Meet shall be held between April 15 and May 31.
- .2 Long Course National Championship Meet Dates The long course (50 meters) National Championship Meet shall be held between August 1 and September 15.
- 104.2. MEET NAME The official name shall be <u>(insert year)</u> United States Masters Swimming National <u>(insert Short or Long)</u> Course Championships.

104.3. AWARDING OF A NATIONAL CHAMPIONSHIP MEET

.1 Meet Rotation System - National Championship Meets shall be awarded using the three-area system as set forth below.

Year	Area 1 West	Area 2 Central	Area 3 East	
1994		SC SC	LC	
1995	LC		SC	
1996	SC	LC		
1997		SC	LC	
1998	LC		SC	
1999	SC	LC		

- A Area 1 Area 1 shall be composed of the following LMSCs: Alaska, Hawaii, Inland Empire, Montana, Oregon, Pacific, Pacific Northwest, San Diego-Imperial, Snake River, Southern Pacific, and Wyoming.
- B Area 2 Area 2 shall be composed of the following LMSCs: Arizona, Arkansas, Border, Central, Colorado, Gulf, Indiana, Iowa, Kentucky, Lake Erie, Michigan, Midwestern, Minnesota, Missouri Valley, New Mexico, North Dakota, North Texas, Ohio, Oklahoma, Ozark, South Dakota, South Texas, Southeastern, Southern, Utah, West Texas, and Wisconsin.

Page 42 PART ONE

C Area 3 - Area 3 shall be composed of the following LMSCs: Adirondack, Allegheny Mountain, Connecticut, Delaware Valley, Florida, Florida Gold Coast, Georgia, Maryland, Metropolitan, New England, New Jersey, Niagara, North Carolina, Potomac Valley, South Carolina, Virginia, and West Virginia.

.2 Bidding Procedures

- A Solicitation of bids The USMS Championship Committee shall be responsible for the solicitation of bids in accordance with the area rotation system in Article 104.3.1, and shall present a list of all certified bidders for each short and long course championship to the House of Delegates at the annual meeting held at least two years prior to the meet being awarded.
- B Eligible bidders A National Championship Meet shall be awarded only to an LMSC or a club with the endorsement of its LMSC. In either event, the facility to be used must be in accordance with the facility standards which have been adopted by USMS, Inc.
- C Bid information The Championship Committee shall provide a bidder with the appropriate bid documents, financial statements from previous championships, and all other information pertaining to the policies and procedures of running a National Championship Meet.
- D Bid deadline All bids for a National Championship Meet shall be returned to the Chairman of the Championship Committee no later than 30 days prior to the annual meeting.
- **Failure to receive bid** Failure of the Championship Committee to receive a suitable bid from the proper area shall negate the rotation system for that meet only and shall not affect the future normal rotation.
- F Out-of-area bids In the event that suitable bids are not received from the designated area 30 days prior to the annual meeting, then the Chairman of the Championship Committee shall notify all Zone Representatives that bidding is open to all areas, provided the bids comply with Article 104.3.2B, and are received prior to the start of the annual meeting of USMS, Inc.
- G Certification of bids Prior to the annual meeting, the Championship Committee shall certify each bid for compliance with its policies and procedures, including facility standards (Article 107).
- Awarding of bids At the annual meeting of the House of Delegates, those bids which are certified shall be presented. The awarding of the bid shall be made by majority vote of the House of Delegates.
- Out-of-rotation meet While the procedures for awarding National Championship Meets need to be clarified and followed whenever possible, it is in the best interest of Masters Swimming to rotate the awarding of National Championship Meets. The Championship Committee shall have

the right to override the procedures set forth above with the concurrence of the House of Delegates.

104.4. USMS ASSISTANCE AND AGREEMENTS

- .1 Contract Successful bidders of National Championship Meets shall sign a written contract with USMS specifying the responsibilities of the meet host and of USMS.
- .2 Payments Successful bidders of National Championship Meets shall pay to United States Masters Swimming, Inc., no later than ten days prior to the beginning of the meet, a fee of \$5.00 per individual entrant in the meet. Upon compliance with the conditions set forth in the Meet Contract, the sum of \$3.00 per entrant shall be returned as stipulated in the contract. Noncompliance with said conditions, as determined by the meet evaluation committee within 30 days of the receipt of the final meet report, shall result in forfeiture of part or all of this amount.
- .3 Assistance to Meet Host The Championship Committee shall provide such assistance and guidance necessary to provide for uniformity in National Championship Meet production. Out-of-pocket expenses for services shall be reimbursed by USMS, Inc.
- .4 Meet Evaluation Committee A five-member meet evaluation committee shall be composed of the Chairman of the USMS Records and Tabulation Committee, if present, plus Championship Committee members present who are not serving on the protest committee. If the above designated composition does not have five members, then elected USMS officers present at the meet may be asked to serve. A written evaluation shall be submitted to the meet host.
- .5 Meet Report The Meet Director of each National Championship Meet shall submit a written report to the Chairman of the Championship Committee within 60 days of the end of competition. This report shall include a complete financial report, copies of meet information, entry forms, heat sheets, and final results, and any other information which may be helpful to future Meet Directors.
- 104.5 CONDUCT OF NATIONAL CHAMPIONSHIP MEETS Conduct of National Championship Meets shall be governed under the swimming rules of USMS, Inc.

.1 Information for Participants

- A General meeting A general meeting of the House of Delegates, members of the Championship Committee, organizing personnel, interested officials, coaches, and swimmers shall be held the evening prior to the first day of the meet.
 - The meeting date, time, and location shall be included in the official meet information.

Page 44 PART ONE

- The Chairman of this meeting shall be the President of USMS, or an individual designated by the President, and the governing body shall be the House of Delegates of USMS.
- 3. Business pertinent to the operation of National Championship Meets and the conduct of the events shall be considered and finalized at this meeting. Changes may be effected in the conduct of the meet to fit the situation.
- 4. Since changes can be made in the operation of a National Championship Meet it is the obligation of every swimmer (or a representative) to arrive with enough time to complete registration and become apprised of any changes which have been made.
- 5. It shall be the Meet Director's responsibility to post notices of changes in conspicuous places at the pool, registration area, and headquarters area prior to the start of the first day's competition.
- B Warm-up schedule A list of times when the competition pool and other facilities will be available for warm-up shall be provided in the premeet information.
- C Heat sheets Heat sheets listing name, age, club, seed time, and heat and lane assignments for pre-seeded events and entry list by time for deck-seeded events, except relays, shall be made available to all swimmers at the time of registration.
- .2 Program A four-day program for National Championship Meets will be used.

A Meet schedules (1994-1996)

Schedule 1 1994 Short Course 1995 Long Course	Schedule 2 1994 Long Course 1996 Short Course	Schedule 3 1995 Short Course 1996 Long Course	
1st Day	1st Day	1st Day	
200 backstroke	200 freestyle	100 IM*	
100 breaststroke	50 breaststroke	200 butterfly	
50 freestyle	100 butterfly	50 freestyle	
200 butterfly	50 backstroke	200 backstroke	
100 IM*	200 free relay	50 breaststroke	
200 medley relay	200 mxd medley relay	200 free relay	
400/500 freestyle	400 IM	400/500 freestyle	
2nd Day	2nd Day	2nd Day	
200 breaststroke	100 IM*	100 breaststroke	
100 butterfly	200 breaststroke	200 freestyle	
50 backstroke	50 butterfly	50 backstroke	
100 freestyle	200 backstroke	200 IM	
200 IM	100 freestyle	100 butterfly	
200 free relay	200 medley relay	200 medley relay	
200 mxd medley relay	400/500 free (women)	200 mxd free relay	

3rd Day	3rd Day	3rd Day
200 freestyle	100 backstroke	100 freestyle
50 breaststroke	200 IM	400 IM
100 backstroke	50 freestyle	50 butterfly
50 butterfly	100 breaststroke	200 breaststroke
200 mxd free relay	200 butterfly	100 backstroke
400 IM	200 mxd free relay 400/500 free (men)	200 mxd medley relay
4th Day**	4th Day**	4th Day**
800/1000 freestyle	800/1000 freestyle	800/1000 freestyle
1500/1650 freestyle	1500/1650 freestyle	1500/1650 freestyle

- * The 100 IM is swum in short course nationals only.
- ** A swimmer may enter only one of the two longest freestyle events at the meet.
- B Rotation of meet formats The particular format shall be rotated in order (1, 2, and 3) among three basic schedules without regard to course.
 - In each schedule, women's events shall precede men's events.
 - 2. In each schedule, at the option of the Meet Director and with the approval of the Championship Committee, the 800/1000 freestyle and the 1500/1650 freestyle may be swum as either the first day program or the last day program.
 - Full days on the schedule may be interchanged so that the 400/500 free and the 1500/1650 freestyle shall not be swum on consecutive days.
 - 4. The three basic schedules shall be chosen every four (4) years, starting in 1990, by a vote of the House of Delegates, from at least four (4) alternatives presented by the Championship Committee.

.3 Event Limit

- A Individual events Competitors may enter and swim in a maximum of six individual events (or five individual events, if deemed necessary by the Championship Committee) in a four day National Championship Meet, with a maximum of three individual events per day.
- **B** Relays Competitors shall be allowed to swim in only one freestyle relay, one medley relay, one mixed freestyle relay, and one mixed medley relay per meet.
- C National qualifying times There shall be qualifying times at National Championship Meets when deemed necessary by the Championship Committee. The Championship Committee shall make that decision prior to the publication of the meet entry form for that meet.

1. Determination of qualifying times. The qualifying times shall be the slowest tenth best time in each event from the previous three years' National Championship Meets. There shall be no qualifying times when there is no tenth best time for that age group in that event during the preceding three years' National Championship Meets.

Note: Until such time that the 19-24 year age group has swum in National Championship Meets for three years, qualifying times for the 19-24 year age group shall be determined using the following sources of information: (a) the tenth best time from the 19-24 age group at National Championship Meets; (b) the tenth best time from the USMS Top Ten list for the 19-24 age group; and (c) the tenth best time from the 25-29 age group at National Championship Meets.

- 2. Event limit When qualifying times are in effect, competitors may enter and swim in a maximum of three individual events without meeting the established qualifying standards. Competitors may enter up to three additional events (or two if the maximum event limit is five) in which they have in the past two years swum a time equal to or better than the qualifying time for those events.
- 3. Verification of times Any competitor who does not meet the qualifying time in a designated time standard event will be required to show verification of the time unless it is listed on the USMS Top Ten list or the official results of the pertinent National Championship Meets.

.4 Entry Procedures

A Eligibility/Affiliation

- USMS registration USMS individual and club registration numbers must be submitted on all entry forms together with entry times. "No time" for swimming events and "Pending" for registration number will not be permitted. A copy of the swimmer's current USMS registration card must accompany his entry.
- Foreign swimmers National Championship Meets will include and welcome foreign swimmers on the same basis as U.S. swimmers except that they may not qualify for USMS Top Ten and All-American awards.
- 3. Affiliation A swimmer's affiliation as stated on the entry form, if valid as of the first day of the meet, will apply throughout the meet, except that a swimmer may become unattached at any time.

B Entry form

 Approval of entry form - Entry forms (both individual and relay) and meet information shall be prepared following the direction of the Championship Committee, and must be approved by the

- Championship Committee in advance of printing. No other forms may be used.
- 2. Distribution of entry form One copy each of the individual and relay entry forms and the meet information shall be sent to all LMSC Chairmen, all registered clubs, and the USMS Board of Directors as soon as the entry form and information are available and no later than five months prior to the first day of the meet.
- Completion of entry form All competitors, including members of relay teams, must fill out and sign the appropriate entry forms.
- 4. Relay entry cards On the relay card, relay teams must list the name of the registered swim club and the full name (as it appears on the USMS registration card), the age, and the meet ID number of each relay member. The age group of the relay team may be changed prior to the relay check-in deadline.

C Entry deadline

- Individual entry deadline The deadline for receipt of entries for National Championship Meets shall be not more than 35 days prior to the first day of competition.
- Relay entry deadline Relays may be entered the day before the meet starts. Participants therein must have entered the meet 35 days in advance. Relays entered after the original meet entry deadline will pay 1.5 times the normal entry fee. Official USMS relay cards must be used.
- D Entry fees Entry fees for National Championship Meets shall be \$4.00 for individual events and \$8.00 for relays. A \$13.00 surcharge may be charged to be used by the meet sponsor to help pay meet expenses. A banquet or social event may be conducted for an additional fee. Participation in this event is optional.

.5 Seeding

- A General procedures for seeding (also see Article 102.10)
 - 1. All information regarding seeding must be stated on the entry form.
 - In order to assure seeded positions, the best competitive times of all entries must be submitted.
 - All events 200 yards/meters or less shall be pre-seeded, with oldest age groups first, slowest heats swum first within each age group.
 - 4. Events longer than 200 yards/meters, except for 1000/1650 yards or 800/1500 meters, may be pre-seeded per Article 104.5.5A (3), (5), (6), and (7), or may be deck-seeded by one of the following methods: (a) by entry time only, (b) by age group first, then by time, or (c) by a combination of (a) and (b). The USMS Championship Committee shall make all seeding decisions, including which events will be deck-seeded.

Page 48 PART ONE

- The last heat shall be composed of the swimmers with the fastest submitted times, the next to last heat composed of the next fastest swimmers, etc.
- 6. After all full heats are seeded within each age group, the remaining swimmers shall be seeded with the next available age group of remaining swimmers.
- If, in any age group, there are not enough swimmers for a complete heat, all swimmers in that age group shall be seeded in adjacent lanes for pre-seeded events.
- On those occasions when only one pool is used for both men's and women's events, heats shall be apportioned and alternated by sex.
- 9. There will be no splitting of age groups into AM and PM sessions. However, at the Meet Director's discretion, swimmers whose seed times will inordinately delay the progress of the meet may be seeded individually in an outside lane with mechanical timing, thus allowing the continued sequence of the regularly scheduled heats.
- 10. At the option of the Meet Director, relays may be deck-seeded.

B Distance events

- The 1000/1650 yard or 800/1500 meter freestyle shall be deckseeded as in Article 104.5.5A(4).
- 2. Willing and able competitors in the freestyle events over 200 meters may swim two-to-a-lane when only one course (7, 8, 9, or 10 lanes) is available for the event. Heats with two swimmers to a lane shall be completed before the heats with a single swimmer per lane. (See Article 102.10.3 for principles of seeding two-to-a-lane).
- C Multiple courses When the depths of the courses vary, male and female contestants shall share equal time in the deep end of the pool. Women's events shall be scheduled in the deeper course on days one and three in odd years, and on days two and four in even years. In the event that both courses are the same, the rotation shall not be affected.

.6 Club Scoring

- A Scoring All National Championship Meet scoring and awards shall be treated as if the meet were swum in a ten-lane pool, regardless of the actual number of lanes available. Points shall be awarded as in Article 102.12.3.
- B Categories Club scoring will be tabulated in three categories.
 - 1. Women's women's individual events and women's relay events.
 - 2. Men's men's individual events and men's relay events.
 - Combined women's individual events, women's relay events, men's individual events, men's relay events, and mixed relay events.

C Divisions - Two divisions shall be recognized for purposes of club scoring based upon the number of swimmers entered in the meet from each club. The number of entrants from a club which will constitute a Division I (Large) or Division II (Small) team will be determined after the meet entry deadline by the Championship Committee.

.7 Awards

- A Awards All top finishers in each race will be given awards regardless of the nationality of the swimmer. Duplicate awards will NOT be given except in the case of ties. Appropriate awards as determined by the Championship Committee will be awarded for places one through ten.
- B USMS championship patch Each individual who wins a short course or long course individual or relay championship shall be awarded a USMS championship patch. Swimmers winning more than one championship may purchase one additional patch for each additional championship won.
- C Club awards The organization conducting the National Championship Meet will provide awards to the first, second, and third place winners in the women's, men's, and combined categories in both Division I and Division II.

.8 Results

- A Posting of meet results Photocopies of event/heat tapes must be posted for each heat and lane before or simultaneously with the posting of the results (see Article 103.6.6C).
- B Publication of meet results Meet results in the appropriate format (see Appendix B) and club scores shall be published within thirty days of the last day of the meet and distributed to members of the USMS Board of Directors, representatives of participating clubs, and the USMS Records and Tabulation Chairman.

.9 Protest Procedure

- A Protests against judgment decisions of Starters, stroke and turn judges, and relay take-off judges may only be considered by the Referee of the meet.
- Protests affecting the eligibility of an individual or a team to compete, or protests arising from the competition itself, shall be handled by a panel of five persons comprised of one representative each from the Championship Committee, Registration Committee, and Rules Committee, plus two swimmers selected from other than the host team by the other three panel members. This panel shall be chaired by the representative from the Championship Committee. Protests shall be submitted in writing, heard by the panel, and decisions rendered no later than the last day of competition. Both the party lodging the protest and the party charged shall be afforded a chance to be heard. The decision of the panel shall be final.

Page 50 PART ONE

- C Any protests made following the close of competition shall be directed to the Chairman of the Championship Committee for resolution.
- .10 Personnel (Also see Articles 102.18 and 103)
 - A Meet Director The Meet Director shall follow the swimming rules of USMS, Inc., and the policies and procedures established by the Championship Committee with regard to the planning and execution of the requirements for a National Championship Meet.
 - B Officials The minimum number of officials at each session of a USMS National Championship Meet shall include the following:
 - 1 Meet Referee
 - 1 Deck Referee for each course
 - 1 Starter for each course
 - 1 Recall Starter for each course
 - 2 Stroke and Turn Judges for each course
 - 2 Timers per lane for each course
 - 1 Recall Rope Operator for each course

The Referees, Starters, and stroke and turn judges shall be certified by USS, YMCA, or any other USMS-approved certifying body. An official may serve in only one officiating position during any event. For freestyle events 400 meters and longer, the Referee and Starter may double as stroke and turn judges.

.11 Facilities and Equipment (Also see Article 107)

- A If more than one course is to be used in a National Championship Meet, then each course must have its own automatic timing system.
- B All courses must have electronic readout boards. For at least one course, the electronic readout board must have the capability of displaying times for all lanes simultaneously.
- C Automatic timing equipment shall be provided for all courses during the competition.
- D The event number and heat number for each heat in the water must be displayed in a location easily visible to the participants for each course being used.
- E The organization conducting the National Championship Meet shall use a computer to compile entry lists, heat sheets, entry cards, and final results.

ARTICLE 105: RECORDS, TOP TEN TIMES, AND ALL-AMERICAN RECOGNITION

105.1. REQUIREMENTS FOR RECORDS AND TOP TEN TIMES

. 1 All times must be made in USMS sanctioned meets or recognized events.

- .2 Times to be considered for Records and Top Ten Times must be made on or before May 31st for short course yard times, September 15th for long course meter times, and December 31st for short course meter times. These times shall be forwarded to the Records and Tabulation Chairman by July 15th, October 20th, and February 5th, respectively.
- .3 Each LMSC is responsible for reporting the Top Ten Times and USMS National Records achieved in its LMSC in the appropriate format (see Appendix B), including all times achieved by swimmers from other LMSCs.
- .4 To be considered for National Top Ten Times or for USMS National Records, all relay times must include the name of the registered swim club and the full name (as it appears on the USMS registration card), the age, and, for mixed relays, the sex of each swimmer. For all individual events, eligibility is based on current USMS registration as noted on the entry card, and the results must contain the full name and age of each swimmer.
- .5 USMS National Records shall be published in the USMS Code of Regulations and Rules of Competition.

105.2. TOP TEN TIMES

- .1 The ten best times nationally in each age division and for each sex shall be published annually for the events listed under Article 102.5.
- .2 Individual split times will be considered for Top Ten Times if recorded by fully automatic timing equipment and provided such splits are brought to the attention, in writing, of the meet director. Such split times shall be included separately in the summary of results prepared by the meet director, and submitted to the LMSC Top Ten Recorder.
 - Note: Performances in this category require the swimmer(s) to complete the full distance of the scheduled event without being disqualified.
- .3 In order for a time to be valid for Top Ten Times consideration, a minimum timing quality of two hand-held watches, averaged per USMS rules (see Article 103.8.3), must be used.

105.3. USMS NATIONAL RECORDS

- .1 The fastest time by a USMS-registered swimmer in each event in USMS sanctioned competition or recognized event shall be designated as a USMS National Record.
- .2 Records shall be achieved only in recognized distances and strokes as listed in Article 102.5.
- .3 Records must be made in accordance with all pertinent rules of USMS.
- . 4 Times may be submitted for Masters records only.
- .5 A record can only be made in still water.
- . 6 Records shall require three watches, semi-automatic timing with three buttons, or automatic timing.

Page 52 PART ONE

.7 Records established by a swimmer's split time in an individual event shall be acceptable as an individual performance for all official purposes if recorded by fully automatic timing equipment and provided such splits are brought to the attention, in writing, of the meet director. Such split times shall be included separately in the summary of results prepared by the meet director and submitted to the LMSC Top Ten Recorder. Relay lead-off split times will not be considered for Records or Top Ten times.

Note: Performances in this category require the swimmer(s) to complete the full distance of the scheduled event without being disqualified.

- .8 Records must be achieved in the relevant stroke/event (e.g., a backstroke record must be set in a backstroke event, etc.). Records set in freestyle events can be submitted only as freestyle records, regardless of the stroke or strokes used.
- .9 Record times shall be submitted in hundredths of a second (two decimal places). If times are tied to the hundredth of a second, the results shall be declared a tie and records shared by all swimmers thus tied.
- .10 When a record is claimed, an official record application form shall be filled out, signed by the designated officials, and transmitted immediately following performance with all supporting data, including official meet results, the primary printout tape, and/or copy of the entry card with timers' signatures to the Records and Tabulation Chairman. Responsibility for this lies with either the LMSC Records Chairman or the Official Scorer of the meet.
- .11 Records set outside the United States shall be applied for on official record application forms and are subject to all pertinent requirements.

105.4. ALL-AMERICAN RECOGNITION

- .1 Individual Recognition The registered USMS swimmer with the fastest listed time for an individual event for that season shall be declared the All-American in that event for the year.
- .2 Relay Recognition The registered USMS swimmers from each relay team with the fastest listed USMS Top Ten time for that season shall be declared the Relay All-Americans in that event for the year.
- 105.5. WORLD RECORDS Applications and documentation for world records (25 meter and 50 meter courses only) shall be supplied to the USMS Records and Tabulation Chairman within thirty days of the date of the swim.

ARTICLE 106: HEALTH AND SAFETY REGULATIONS FOR COMPETITION

106.1. MEDICAL EXAMINATION - Each competitor is strongly encouraged to have a complete medical evaluation before beginning Masters training. In addition, it is also recommended that each competitor have a physical checkup immediately prior to Masters competition in order to insure his physical readiness for participation.

106.2. MEDICAL EQUIPMENT - Meet Directors are encouraged to investigate the use of appropriate Emergency Medical Technician equipment and personnel for all meets.

ARTICLE 107: FACILITIES STANDARDS

IMPORTANT: Swimmers are advised that United States Masters Swimming, Inc., accepts no responsibility or liability for injuries resulting from accidents occurring in facilities not owned by United States Masters Swimming, Inc., and strongly urges that all safety precautions be observed during sanctioned events.

107.1. DEFINITIONS

- .1 [M] Mandatory requirement for all competition.
- .2 [M*] Predicated upon facility availability, LMSCs may waive strict compliance with these requirements when sanctioning local competition.
- .3 [NC] Mandatory requirement for National Championship Meets and international competition.

107.2. RACING COURSE DIMENSIONS

- .1 Length
 - A Long course meters 50.00 meters (164 feet-1/2 inch). [M]
 - B Short course meters 25.00 meters (82 feet-1/4 inch). [M]
 - C Short course yards 25.00 yards. [M]
 - D Touch pads When touch pads are used as part of an automatic timing system, the thickness of these pads shall not cause the length of the racing course in any lane to fall below the minimum required length. [M]
 - E Movable bulkheads When the racing course is fixed by the use of movable bulkheads, such bulkheads shall be capable of resisting lateral deflection due to tension exerted by the attachment of the lane dividers to ensure the required course distance in all lanes. [M]
- .2 Width Minimum lane width for competitive swimming shall be 2.13 meters (7 feet). [M*, NC]

.3 Water Depth

A Starting end - Minimum water depth for racing starts, as measured for a distance 1.0 meter (3 feet, 3-1/2 inches) to 5.0 meters (16 feet, 5 inches) from the end wall, during either competition or practice shall be as follows.

Page 54 PART ONE

- In pools with water depth less than 1.07 meters (3 feet, 6 inches) at the starting end, the swimmer must start from the deck or from within the water. [M]
- In pools with water depth 1.07 meters (3 feet, 6 inches) to less than
 1.22 meters (4 feet) at the starting end, starting platforms shall be no more than 0.46 meters (18 inches) above the water surface. [M]
- In pools with water depth 1.22 meters (4 feet) or more at the starting end, platforms shall meet the height requirements of Article 107.11.1. [M]
- B Racing course Minimum water depth shall be 2 meters (6 feet, 7 inches) throughout the course. Based on facility availability, the Championship Meet Committee may waive this requirement for National Championship Meets. [NC]
- 107.3. RACING COURSE WALLS Walls enclosing the racing course shall be parallel and vertical. The end walls shall be at a right angle to the water surface and shall be constructed of solid material with a non-slip surface that extends no less than 0.8 meter (2 feet, 7-1/2 inches) below the water surface. It is recommended that a toe-rest ledge be provided at approximately 4 foot depth in the walls of the deep water race course. [M]

107.4. POOL AND BULKHEAD MARKINGS

- .1 Pool Bottom Lane Markers Minimum 25-cm (10-inch) wide lines of a dark contrasting color (preferably black) shall be provided in the middle of each racing lane on the bottom of the pool. The lines shall preferably be uninterrupted the length of the course and shall terminate 2.0 meters (6 feet, 7 inches) from each end wall with a distinctive cross line 1.0 meter (3 feet, 4 inches) long and the same width as the bottom marker. [M*, NC]
- .2 End Wall Targets Flush, non-slip targets in the shape of a "T" or a cross and the same width as the lane bottom markers shall be provided in the center of each lane on each end wall of the course and shall extend at least 1.0 meter (3 feet, 4 inches) below the level of the water surface. It is recommended that the top edge of the deck be of a contrasting color to provide a visual target above the water at the end of the course. [M*, NC]
- .3 Lane Numbers The lanes shall be numbered from right to left as the swimmers stand facing the course from the starting end of the pool. Lane numbers shall clearly identify the lanes to officials stationed on each side of the course. [M]
- 107.5. OVERFLOW RECIRCULATION SYSTEM The pool water recirculation and overflow system shall maintain the water level in line with the overflow rim of the pool gutters without creating appreciable current or water turbulence and shall maintain a smooth and calm water surface during competition. The pool recirculation system shall be turned off if, in the opinion

of the Referee, the water movement interferes with the conduct of competition. [M]

- 107.6. WATER TEMPERATURE Water temperature between 78 and 80 degrees Fahrenheit shall be maintained for competition. [M*, NC]
- 107.7. LADDERS All ladders, steps, or stairs within the racing course should be recessed in the pool side walls or removed during competition. [M*, NC]

107.8. OTHER DECK EQUIPMENT

- .1 Unobstructed Deck Use of portable lifeguard chair stands and other deck fixtures is recommended. They should be removed from the competition area to allow free passage and unobstructed view for competitors and officials along all sides of the course. [M*, NC]
- .2 Diving Boards 1-meter diving boards which overhang the racing course shall be hinged out of the way or removed during competition. [M*] [NC]

107.9. LIGHTING

- .1 Illumination For indoor pools, one hundred (100) foot-candle illumination level is required at the water surface over the entire course. Overhead light fixtures shall be located to avoid the casting of shadows by the pool walls over the racing course. [M*, NC]
- .2 National Championship Meets At National Championship Meets the same type and level of illumination must be provided and maintained during the warm-up period and competition. [NC]
- 107.10. NO SMOKING SIGNS No smoking indoors or outdoors shall be permitted in any area designated for swimmers, including spectator seating, standing, and eating areas, and signs shall be so posted. [M]

107.11. STARTING PLATFORM

.1 Height

- A Long course and short course meters The front edge of the starting platform shall be no less than 0.50 meter (1 foot, 8 inches) nor more than 0.75 meter (2 feet, 5-1/2 inches) above the surface of the water. [M]
- B Short course yards The front edge of the starting platform shall be not higher than 0.762 meter (2 feet, 6 inches) above the surface of the water. [M]
- .2 Front Edge of Platform The front edge of the starting platform shall be flush with the face of the end walls. [M]
- .3 Size and Slope of Platform The top surface of the starting platform shall be not less than 0.50 by 0.50 meters (1 foot, 8 inches square) and shall slope

Page 56 PART ONE

- not more than 10 degrees from the horizontal. The entire surface of the platform shall be faced with permanent non-slip material. [M]
- .4 Backstroke Starting Grips Starting platforms shall be equipped with firm starting grips located between 0.3 meter (12 inches) and 0.6 meter (24 inches) above water surface. The front edge of the grips shall be parallel to and flush with the face of the end wall. [M]
- .5 Lane Numbers Starting platforms shall be clearly marked with lane numbers visible to competitors and officials. [M]
- .6 Stability of Platforms Starting platforms shall be anchored to the deck or bulkhead to remain stable at all times without human aid. [M]

107.12. FLOATING LANE LINES

- .1 Installation Lane lines shall extend the full length of the course and shall be attached at each end wall with recessed anchors so located that the center line of the cable securing the lane lines shall be on the surface of the water with the bottom half of the floats uniformly submerged for its entire length. They shall:
 - A Separate the racing lanes. [M]
 - B Be outside the outermost lanes being used. [M*]
- .2 Size, Color, and Safety Dividers shall consist of contiguous floats having a minimum diameter of 5 cm (2 inches) to a maximum of 11 cm (4-1/4 inches). The color of the floats extending from the walls the distance of 5 meters for long course and 15 feet for short course shall be distinct from the rest of the floats. Distinctive colored floats, or markers extending around the full circumference of the floats, shall be placed at 15 meters (49 feet, 2-1/2 inches) from each end wall in both short course and long course pools. Additionally, in long course pools, a distinctive warning line or lane markers may be placed at a distance of 13 meters from each end wall. There shall be no exposed cables accessible to swimmers within the length of the racing course, and the cable take-up spools and ratchet mechanisms shall be completely concealed with durable flexible covers. Damaged or broken floats shall be removed and replaced. [M]
- .3 Number of Lane Lines A single lane line between racing lanes shall be used in long course competition. Multiple lane lines may be installed for short course competition, provided the width of open water between dividers is not reduced to less than 7 feet. [M*, NC]
- .4 National Championship Meets Minimum 11-centimeter diameter floats shall be required for National Championship Meets. [NC]

107.13. BACKSTROKE FLAGS AND LINES

.1 Design - At least three triangular pennants six (6) to twelve (12) inches in width at the base and twelve (12) to eighteen (18) inches in vertical length, of two or more alternating and contrasting colors shall be suspended on a firmly

stretched line over each lane for all backstroke, individual medley, and medley relay events. [M]

.2 Location

- A Long course and short course meters 5 meters (16 feet, 5 inches) from each end of the course, a minimum of 1.8 meters (5 feet, 11 inches) to a maximum of 2.5 meters above the water surface. [M]
- B Short course yards 4.57 meters (15 feet) from each end of the course, 2.13 meters (7 feet) above the water surface. [M]
- C Measurement Height shall be measured to the horizontal line from which the pennants are suspended. [M]
- .3 Marking at Midpoint of Course For long course backstroke, individual medley, and medley relay events a firmly stretched 7 mm (1/4-inch) line without flags or pennants shall be suspended at the midpoint of the course. [M]
- 107.14. LOUDSPEAKER START SYSTEM An electronic sound-generating device shall be provided to give the starting and recall signal. Loudspeakers may be mounted underneath or on the side of each starting platform, between every two platforms, on each side of the racing course, or positioned behind the starting platforms in such a manner that equitable dispersion of sound to all lanes is assured. The device shall also activate a strobe light, or similar optical signal, located on the Starter's side of the course approximately 15 feet forward from the starting end, to indicate the start to manual timers and hearing-impaired swimmers. The start system may include an underwater recall speaker and gun lap signal option. [NC]
- 107.15. FALSE START RECALL ROPE A recall rope to be dropped across the course in case of a false start shall be provided approximately 11 meters (36 feet) from the starting end in short course and 15 meters (49 feet) in long course competition. The rope shall be attached to vertical stanchions with a quick release mechanism and shall be suspended at least 1.22 meters (4 feet) above the water surface at the lowest point. The rope shall be suspended in such a way that when the quick release mechanism is activated the rope immediately drops onto the surface of the water across all lanes of the course. [NC]
- 107.16. PACE CLOCKS There may be at least two large, accurate timing devices or clocks, preferably located one on each side of the course, clearly visible to all swimmers. Dial type clocks shall be at least 3 feet in diameter with sweep second and minute hands. If digital readout clocks are provided, minimum size of the digits shall be 6 inches. [M*, NC]

107.17. AUTOMATIC TIMING EQUIPMENT

.1 Installation and Safety - Equipment shall be installed so that it will not interfere with swimmers' starts, turns, or finishes, or the normal overflow

Page 58 PART ONE

- functions of the pool water recirculation system. All deck-level wiring shall carry no more than 12 volts of current. [M]
- .2 Power Source See Article 103.10 for automatic and semi-automatic timing equipment types and performance requirements. Equipment powered directly from the utility line electrical service shall have the capability to automatically switch to standby battery power source in case of line power failure without affecting the continuity and accuracy of the timing system. [NC]

.3 Touch Pads

- A Size and thickness Recommended pad size shall be 2 meters (6 feet, 6 inches) wide and not less than 0.6 meter (2 feet) deep. Minimum width of pads shall be 1.52 meters (5 feet). Thickness shall not exceed one centimeter (3/8-inch). [NC]
- B Markings Panel face markings shall conform to and superimpose on pool end wall markings as closely as possible. Perimeter edges of the panel shall have a one inch wide black border. [NC]
- C Sensitivity Panels shall stop the timing system instantaneously by a light hand touch anywhere on the flat surface facing the race course and the upper edge but shall not be activated by water turbulence. [NC]
- D Installation and safety Panels shall be installed and firmly anchored in the center of each lane and shall have no sharp edges, corners, or other protrusions on any exposed surfaces. [NC]
- .4 Optional Accessories Automatic timing equipment may provide relay judging capability, automatic lap counting, split time readouts for all lanes, correction of erroneous touch, and television equipment tie-in. Any corrections or impulses generated by the equipment operators shall be clearly identified on the results printout.
- .5 Time Display Board An automatic display board visible to all swimmers shall give a digital time readout to two decimal places, displaying split times, final times, and places for all lanes. In the event of a tie, the place shall be displayed as a tie. A separate line of display for each lane meeting the above requirements shall be provided for National Championship Meets on at least one course. A one-line board is the minimum requirement for a second course. [NC]
- 107.18. ELECTRICAL SAFETY All permanent or temporary electrical connections to the electronic loudspeaker start system, automatic timing equipment, and other electrical or electronic devices operating on line voltages in the vicinity of the racing course shall be made only from ground-fault circuit interrupter (GFI) protected convenience receptacles or circuits. In the event such receptacles or circuits are not available in the facility used for competition, portable UL-approved self-contained GFI outlet fittings shall be provided (furnished and installed) at the nonprotected convenience receptacles by the meet management, meet director, or the equipment operator(s) whenever such equipment is connected and in use. [M]

PART TWO: ADMINISTRATIVE REGULATIONS OF COMPETITION

ARTICLE 201: ATHLETE REGISTRATION AND REPRESENTATION

- 201.1. MEMBERSHIP OF ATHLETES. All swimmers competing in events sanctioned by USMS must be registered with USMS or their nation's recognized Masters swimming governing organization.
- .1 Annual Registration Athlete registration is for the period January 1 through December 31 of each year. Swimmers applying for registration on or after November 1 will be issued a registration card valid through December 31 of the following year.
- .2 One-Event Registration An LMSC may offer a single event registration which allows an athlete to participate in ONE sanctioned event. Registration cards will NOT be issued for one-event registration. One-event registrants must be considered unattached and agree to be governed by the rules and regulations of USMS, except that their times will not be considered for Top Ten tabulation or National or World records. One-event registrants shall be identified as such in the meet results.

.3 Registration Forms

- A Registration forms Athlete registration forms may be obtained from the Registration Chairman of the LMSC. The form, fully completed, shall be submitted with the applicable fee to the Registration Chairman of the LMSC, who shall issue a registration card.
- B Liability release All registration forms shall contain the exact language of the liability release according to Article 203.1. The language may not be further modified in any way.
- .4 Registration Fee The annual registration fee is composed of the following elements:
 - A national fee established by the Board of Directors or the House of Delegates.
 - B A local fee established by the LMSC.

201.2. REPRESENTATION

- .1 There shall be only one USMS registration per individual permitted at any time.
- .2 In order for a swimmer to compete as a representative of a club, that club must be a member in good standing of an LMSC and USMS.

Page 60 PART TWO

- .3 A swimmer need not reside in the LMSC territory in which the club the swimmer represents is located but must be registered in that LMSC.
- . 4 An unattached competitor is a registered swimmer who represents no club.
- .5 A swimmer shall not represent any club in competition for sixty (60) consecutive days before transferring affiliation to another club, unless this transfer takes place at the time of annual re-registration. A swimmer may declare his affiliation as unattached at any time without written application.
- .6 A club wishing to change its LMSC affiliation must approve such change by a majority vote of its general membership at a regular club meeting or at a special meeting called for that purpose, with the vote duly certified by the club's president and secretary. The transfer also must be approved by a majority vote of the officers of the club's current and proposed LMSCs. If approved, the transfer shall be effective sixty days after receipt of written notice by the National Registrar.
- .7 All applications for changes of registration (including transfers) must be accompanied by a reasonable fee to be determined by the LMSC in which the swimmer will be registered after the change of registration.

201.3. TRAVEL PERMITS

- .1 A current USMS registration card shall serve as a valid travel permit.
- .2 Any competitor touring in a foreign country may also obtain from the national Masters Swimming registration chairman or the chairman's designee a written authoritative permission to compete in such country.

ARTICLE 202: SANCTION/RECOGNITION

- 202.1. SANCTIONS Times swum at sanctioned events are considered for USMS National records and Top Ten Times. All swimmers entered in a sanctioned event shall be registered with USMS, or shall have a valid travel permit or its equivalent, or have other acceptable proof of current Masters Swimming registration.
- .1 Sanction Requirements sanctions will be issued, withheld, or withdrawn in accordance with the following:
 - A Applications for sanction shall be made to the LMSC within whose territorial limits the event is held and applications shall be accompanied by a copy of the entry form and applicable fee.
 - The entry forms shall contain the exact language of the liability release as stated in Article 203.1. All swimmers, before participating, shall have signed a release containing the exact language of the liability release as stated in Article 203.1. The language shall not be modified in any way, except that the names of

- additional insureds may be inserted after "...Local Masters Swimming Committees".
- Entry forms and programs must bear the statement, "Sanctioned by (LMSC name) for USMS, Inc. Sanction number: ____."
- 3. The sanction fee shall be established by the LMSC.
- B All sanctions shall be signed by the LMSC's authorized representative, and a record thereof shall be retained for two years.
- C Sanctions issued to one organization cannot be transferred to another. Any sanctions so transferred shall be void for all purposes, and the LMSC may deny further sanctions to any organization violating this provision.
- D No sanction may be issued to any organization whose interest in sports and games is purely commercial, or where the event is to be promoted solely for the profit or the advertising value to be derived therefrom. Any income derived from sanctioned events must be used for the general welfare of the promoting organization as a whole.
- E No sanction of any event will be granted with the word "Olympic" or any derivative thereof used in any manner in connection with said event unless consent is obtained from the USOC.
- F All sanctioned events are subject to the following conditions:
 - The conduct of a sanctioned event shall be in strict compliance with applicable USMS swimming rules and administrative regulations.
 - 2. All swimmers shall submit with their entries copies of their current registration cards or travel permits, or supply proof of current Masters registration acceptable to the LMSC, except that, at the discretion of the Meet Director and exclusive of National Championship Meets, a swimmer may enter indicating "number pending," so long as proof of valid registration is presented prior to the swimmer's participation in the event.
 - 3. A swimmer's valid affiliation and age must be displayed after the name on the heat sheet or in the program.
- G A further sanction may be denied to any organization which has failed to conduct such meet in accordance with applicable USMS swimming rules and administrative regulations, or as stated on the entry form.
- 202.2. RECOGNIZED EVENTS -Times swum at recognized events may be considered for USMS National records and Top Ten Times if a designated USMS observer is present and verifies in writing that the conduct of the competition conforms to the relevant USMS swimming rules and administrative regulations, or the event is organized by USS, FINA, MSI, or CASA (Swimming Canada Natation).
- .1 Recognition Recognition will be issued, withheld, or withdrawn in accordance with the following:

Page 62 PART TWO

- A Applications for recognition of non-foreign events shall be made to the LMSC within whose territorial limits the event is held and applications shall be accompanied by the recognition fee. The recognition fee shall be as established by the LMSC.
- B All recognitions shall be signed by a designated member of the LMSC, and a record thereof shall be retained for two years.
- C Recognition issued to one organization cannot be transferred to another. Any recognition so transferred shall be void for all purposes, and the LMSC may deny further recognition to any organization violating this provision.
- D No recognition may be issued to any organization whose interest in sports and games is purely commercial, or where the event is to be promoted solely for the profit or the advertising value to be derived therefrom. Any income derived from recognized events must be used for the general welfare of the promoting organization as a whole.
- E All recognized events are subject to the following conditions:
 - The conduct of a recognized event shall conform to relevant USMS swimming rules and administrative regulations.
- F Further recognition may be denied to any organization which has failed to conduct said competition in accordance with applicable USMS swimming rules and regulations, or as stated on the entry form.
- G Recognition for foreign meets, other than those organized by FINA, MSI, or CASA shall be obtained from the USMS Registration Committee Chairman.

ARTICLE 203: LIABILITY RELEASE

203.1. All registration forms, sanctioned entry forms, and recognized event entry forms must include a liability release. The liability release must be signed by the person registering or entering. The language of the release must be:

"I, the undersigned participant, intending to be legally bound, hereby certify that I am physically fit and have not been otherwise informed by a physician. I acknowledge that I am aware of all of the risks inherent in Masters Swimming (training and competition) including possible permanent disability or death, and agree to assume all of those risks. AS A CONDITION OF MY PARTICIPATION IN THE MASTERS SWIMMING PROGRAM OR ANY ACTIVITIES INCIDENT THERETO, I HEREBY WAIVE ANY AND ALL RIGHTS TO CLAIMS FOR LOSS OR DAMAGES INCLUDING ALL CLAIMS FOR LOSS OR DAMAGES CAUSED BY THE NEGLIGENCE, ACTIVE OR PASSIVE, OF THE FOLLOWING: UNITED STATES MASTERS SWIMMING, INC., THE LOCAL MASTERS SWIMMING COMMITTEES, THE CLUBS, HOST FACILITIES, MEET SPONSORS, MEET COMMITTEES, OR ANY INDIVIDUALS OFFICIATING AT THE MEETS OR SUPERVISING SUCH ACTIVITIES. In addition, I agree to abide by and be governed by the rules of USMS."

PART THREE: LONG DISTANCE/OPEN WATER SWIMMING RULES

ARTICLE 301: ADMINISTRATION

301.1. ORGANIZATION - The conduct and organization of Long Distance/Open Water Swimming for Masters shall be governed exclusively by USMS through its Long Distance Committee and LMSCs. The Chairman and committee members shall be appointed as provided in Article 506.2.9.

301.2. REGISTRATION AND SANCTIONS

- .1 All swimmers competing in long distance/open water events sanctioned by USMS must be registered with USMS or their nation's recognized Masters Swimming governing organization.
- .2 Sanctions or recognitions shall be required for all long distance/open water events. LMSCs are responsible for issuing sanctions or recognitions for events involving USMS athletes. If the event is to be swum in more than one LMSC, the LMSC where the event will originate will have jurisdiction in issuing the sanction or recognition. This does not prohibit the other LMSC from issuing a sanction or recognition for the event.
- .3 A long distance/open water competition may include both USMS and USS events, with the USMS events sanctioned or approved by USS. Under no circumstances shall a USMS athlete and a USS athlete be considered part of the same event. Athletes holding both USMS and USS registrations must declare their race affiliation, in writing, prior to the start of the event.
- 301.3. LIABILITY RELEASE Entry forms shall contain the exact language of the liability release according to Article 203.1. The following statement shall be added to the end of the release: "In addition, I specifically acknowledge that I am aware of all the risks inherent in open water swimming and agree to assume those risks." The language shall not be modified in any way except that the names of additional insureds may be inserted. The liability release must be signed by each person entering the meet.

ARTICLE 302: EVENTS

302.1. DEFINITIONS

.1 A long distance event is any swimming event over 1650 yards (1508.8 meters) in length. The event may be conducted in any body of water, either natural or man-made.

Page 64 PART THREE

- .2 An open water event is a swimming event of any distance conducted in an open body of water, either natural or man-made.
- **302.2. EVENTS** Long distance events shall consist of individual or team competition as follows:
- .1 Quarter-mile Straightaway The course shall be set in stationary open water and shall be a quarter of a mile (440 yards) straightaway using a cable with floats stretched between two fixed and stationary markers in the water. The distance between the anchoring points of the cable shall be maintained within plus or minus six inches, measured to the outer edge of the turning markers. A stationary water start and an in-the-water finish shall be used.
- .2 Open Water As surf, beach, tide, temperature, and other physical factors vary, the Meet Director shall determine the course for open water events. The course shall be measured as accurately as possible. The Meet Director shall determine the type of start to be used. As course distances and conditions are different, no records will be maintained; however, meet managers are encouraged to keep meet results. The distances shall be the same for both men and women and may be contested at the same time with separate results tabulated. Age groups and other classifications may also be swum at the same time, but again tabulated separately.
- .3 Time/Distance The object of the event is to determine who can swim the greatest distance in a given time period. The person swimming the farthest shall be declared the winner. The person swimming the second greatest distance shall be awarded second place, etc. In the event that two or more swimmers swim the same distance, a tie shall be declared. The events shall be swum in a pool at least 25 yards in length. The distance shall be computed by multiplying the total lengths swum by the length of the pool and adding the last completed five-yard increment; if the event is swum in a metric pool, the distance shall be determined in meters and converted to yards by multiplying 1.0936 times the number of meters completed and rounding off the distance to the last completed five-yard increment. All distances shall be reported in yards.

There shall be an adult acting in the capacity of a Starter/head timer/Referee (may be one person) present at all times, having no other responsibilities during the period of the swim. For each swimmer, there shall be a separate lap counter who shall record split times for every lap during the swim. A stop watch or electronic timing system shall be used to time the event. Drafting shall not be permitted in time/distance events. In pools that are 50 meters or longer, the Referee shall establish procedures to prevent drafting if more than one swimmer is competing per lane. In pools that are less than 50 meters, no more than two swimmers shall share a lane. When two swimmers are sharing the same lane, they shall conform to Article 102.10.3A(6)a and b.

.4 Individual Long Distance Swims - Swims must be sanctioned by the LMSC in which the swim originates and conducted in accordance with all pertinent rules and regulations. If more than one swimmer is attempting to swim, only one sanction need be issued. All times achieved in long distance individual attempts should be duly certified and made a matter of record by the sanctioning LMSC. The certification should include:

- A Each swimmer's name, age, sex, and registration number.
- B Governing body sanctioning the event.
- C Course: to include the name of the body of water, the starting and finishing points, and the measured distance.
- D Verification and documentation that all rules were observed and the swimmer(s) either completed or failed to complete or attain the distance.

.5 Postal

- A A postal event is a competition in which swimmers swim the event at a place of their choosing and send the time or distance to a central location for tabulation.
- B Each entrant in a postal event will be responsible for the validity of the figures and the distance submitted.
- C Postal events conducted in pools must comply with all rules of USMS and Article 302.2.3. The Meet Director shall have the discretion to designate the size(s) of the pools in which the event is swum.
- D The Meet Director shall have the discretion to request additional verification of completion from any entrant, and may refuse to accept any entry that appears to contain erroneous information.
- .6 Team A team event may be contested on a total time/distance or pointsystem basis and may consist of any number of members.
 - A Time/distance basis A specified number of contestants on each team shall be considered in the computations for team scoring. The team whose top specified number of swimmers have the lowest cumulative time or the greatest cumulative total yards shall be declared the winner. A similar method will be used to determine second, third, and subsequent places. In the event of ties, the team whose individual member finished nearest to first place shall be declared the winner or awarded the place.
 - B Point basis Points are awarded on the basis of overall finishing position, with one point for first place, two points for second place, etc. The points of specified team members are added and the lowest cumulative score determines the winning team; the second lowest score, the second place, etc. In the event that two or more teams score the same number of points, the team that has the swimmer who won or finished closest to the first place shall be declared the winning team.
 - C No individual entries can be accepted in the team events. All entries must be made by registered USMS clubs and signed by an authorized official of the club making the entry.
 - D Mixed sex teams may be entered, provided at least one swimmer of each sex is represented as follows:

Total number of team members	Females	Males
2	1	1
3	minimum 1	minimum 1
4	2	2
5	minimum 2	minimum 2
6	3	3

.7 Relays - Relay teams shall consist of two or more swimmers as specified on the entry form. The team members shall rotate in the same order throughout the event. The time or distance each swimmer is required to spend in the water shall be specified on the entry form. The changeover to the new swimmer will be made as soon as is practically possible after the completion of the previous swimmer's leg. In the exchange in open water events, physical contact must be made between the two swimmers. In pool events, the exchange is governed by Article 101.7.3C and H.

ARTICLE 303: SAFETY PRECAUTIONS

- 303.1. SAFETY STANDARDS As conditions and courses vary, it is the responsibility of each swimmer to know and follow the safety standards necessary for protection from as many dangers as possible. The Meet Director can assist this endeavor by:
- .1 Obtaining necessary permits/approvals from the U. S. Coast Guard, park authorities, lifeguard associations, etc.
- .2 Providing accurate maps with course descriptions and other pertinent information with entry forms and meet information packets.
- .3 Planning for possible medical evacuations.
- . 4 Assigning rescue/aid personnel and craft.
- .5 Planning for escort paddlers or craft. Personal escorts should be considered for open water swims.
- .6 Making provisions for controlling escort craft and access of nonrace craft into the race area.
- .7 Briefing all contestants, coaches, managers, trainers, and meet officials.
- .8 Planning for possible cancellation, postponement, and/or modification of the event.
- .9 Considering use of fluorescent orange and other brightly colored caps to assist in identification and visibility of swimmers in open water events.

Note: LMSCs are encouraged to develop their own safety guidelines and precautions for the conduct of long distance/open water events, provided they are not in conflict with USMS rules, policies, or procedures.

303.2. ESCORTED SWIMS

- .1 In any event for which it has been arranged that an escort craft or paddler will accompany each swimmer throughout the event, all swimmers must be accompanied by such an escort paddler or craft. If the escort paddler or craft becomes disabled or cannot continue to accompany the swimmer, the swimmer must either stay in the water next to the escort craft until a replacement arrives, or exit the water.
- .2 If a swimmer's escort paddler or craft becomes unable to accompany its swimmer as per Article 303.2.1, a paddler or craft escorting another swimmer may assume responsibility for the swimmer with the disabled escort, subject to the following conditions:
 - A Any one paddler or craft may escort no more than two swimmers.
 - B The two swimmers must stay within five meters of each other. Failure to stay within five meters shall result in immediate disqualification of the second swimmer and the immediate removal of that person from the water.

ARTICLE 304: CONDUCT OF THE COMPETITION

304.1. STARTS

.1 Types

- A Stationary Swimmers start from a platform or in the water with no forward motion.
- B Running Swimmers line up a short distance from the water behind a marked line. At the starting signal, the swimmers run into the water and swim the prescribed course.
- .2 Starting Signal The starting signal will be by gun, horn, whistle, siren, etc., audible to all contestants or if necessary by voice audible to all contestants.

304.2. SEEDING

- .1 When practical, swimmers shall be seeded by their 1500 meters/1650 yards times. The manner of seeding "no times" will be at the discretion of the Meet Director as stated in the meet entry sheet.
- .2 The fastest swimmers in quarter-mile straightaway course events shall be seeded in order of time with the fastest swimmer receiving the preferred position. If subsequent rows are needed, they will be seeded in a similar method behind the first row of swimmers.

Page 68 PART THREE

.3 Events for different age groups and sexes may be combined to allow the swimmers to compete at the same time. Separate starts are preferable in quarter-mile straightaway events.

304.3. FINISHES

- .1 In the Water Swimmers shall touch a vertical surface or swim across a defined finish line. Place judges and timers shall position themselves accordingly.
- .2 Out of the Water Swimmers shall leave the water, as defined by the course, and run up the beach to a marked finish.
- .3 Incomplete Race The Referee shall determine if the start of a race is to be postponed or canceled, or if a race in progress is to be stopped. If a race is stopped and swimmers are removed from the water for their safety, the Referee shall determine if the race is to be restarted, canceled, or considered official.

304.4. COSTUME - For non-National Championship events

- .1 Swimmer's costumes must be non-transparent and conform to the current concept of the appropriate. The Referee shall have the authority to ban offenders from competition until they appear properly costumed. Goggles, ear plugs, and grease shall be allowed. The suit shall be made of a porous material.
- .2 Swim cap(s), including those made of neoprene, may be permitted. Swim caps shall be defined as head gear conforming to a traditional swim cap design and shall not extend to protect the neck or shoulders.
- .3 Wet suits may be allowed at the discretion of the Meet Director. As wet suits generally provide a competitive advantage, prizes shall be awarded separately to non-wet suit and wet suit competitors. Any published results or records must clearly indicate which swimmers wore wet suits.
- .4 Devices used to maintain body heat are illegal, except for those listed in Articles 304.4.1, 304.4.2 and 304.4.3.
- .5 Apart from Articles 304.4.2 and 304.4.3, flotation and propulsive devices are not permitted, except in designated events where all swimmers are using similar devices.
- .6 Products involving tobacco, alcohol, or pharmaceuticals containing drugs banned under IOC or FINA rules may not be advertised, but the advertiser's name only may be used.

304.5. OFFICIALS

- .1 There shall be a Meet Director, Referee, safety coordinator, scorer, announcer, clerk of course, Starter, and a sufficient number of judges, inspectors, timers, and medical personnel.
- .2 The clerk of course shall ensure that all entrants in open water events are visibly marked with their entrant numbers.

.3 Official craft shall be placed in a position in open water events to best observe yet not physically hinder the swimmers.

304.6. DISQUALIFICATIONS - Swimmers shall be disqualified if they:

- Or their personal escort willfully or intentionally delay the progress of another swimmer. Accidental contact, especially at the start, shall not be considered a disqualification. However, the flagrant disregard of another swimmer's rights shall result in disqualification.
- .2 Fail to complete the prescribed distance or course, within the pre-announced time
- .3 Fail to follow race rules.
- .4 Receive assistance by pulling on the cable or buoys at the turn or on the course.
- .5 Receive propulsive aid from anyone in boats, on surfboards, etc.
- . 6 Receive unauthorized assistance at the start or finish.
- . 7 Violate costume rules.
- . 8 Draft off another swimmer in time/distance pool events.
- . 9 Are swimming in a manner in which their personal safety is jeopardized.
- 304.7. AGE GROUPS Age groups in individual events for men and women shall be 19-24, 25-29, and five year increments as high as is necessary to include all entrants.

ARTICLE 305:

NATIONAL LONG DISTANCE/OPEN WATER CHAMPIONSHIP MEETS

305.1. ELIGIBILITY

- .1 All swimmers competing in National Long Distance/Open Water Championship events shall be registered with USMS or their nation's recognized Masters Swimming governing organization.
- **305.2. EVENTS** The Long Distance Committee shall award National Long Distance/Open Water Championship Meets.
- .1 National Championship Meets will be recognized in the following events:
 - A One Mile (quarter-mile straightaway or open water course)
 - B Quarter-mile Straightaway (2 miles)
 - C Open Water (1.5-3 miles)
 - D Open Water (3.5-5 miles)
 - E Open Water (6+ miles)

Page 70 PART THREE

- F Postal One Hour
- G Postal 10 Kilometer (in a 50 meter pool)
- H Postal 6000 Yard (in a 25 yard pool)
- . 2 Team events (as defined in Article 302.2.6).
 - A Team events shall be recognized in the Quarter-mile Straightaway (2 mile), Postal One Hour, and Postal 6000 Yard.
 - B Team events shall be recognized in the following age groups, as determined by the age of the youngest swimmer: 19+, 25+, 35+, and ten year increments as high as is necessary to include all entrants.
 - C Team events shall be determined by the Long Distance Committee.
- .3 Individual age groups for National Long Distance/Open Water Championship Meets shall be the same as Article 304.7.

305.3. SITE SELECTION

- .1 Bids shall be due, in writing, to the Long Distance Chairman, at or before the first Long Distance Committee meeting of the annual meeting.
- .2 Championships shall be awarded by the Long Distance Committee at the annual meeting.
- .3 Events not awarded at the annual meeting shall be awarded by the Long Distance Chairman.
- .4 Suitable bids shall comply with all applicable USMS swimming and long distance rules, policies, and procedures.
- .5 The following area award system will be followed for the bidding of Long Distance Championships. Area definitions shall be the same as those in Article 104.3.1. Bids will be received up to two years in advance of the year bid. If suitable bids are not received from a qualifying area, bidding shall be opened to all areas.

	Area 1 West	Area 2 Central	Area 3 East
1994	2 mile cable 6000 yd postal	1 mile Open wtr 3.5-5 mi 1 hour postal	Open wtr 1.5-3 mi Marathon 6+ mi 10K postal
1995	Open wtr 1.5-3 mi Marathon 6+ mi 10K postal	2 mile cable 6000 yd postal	1 mile Open wtr 3.5-5 mi 1 hour postal
1996	1 mile Open wtr 3.5-5 mi 1 hour postal	Open wtr 1.5-3 mi Marathon 6+ mi 10K postal	2 mile cable 6000 yd postal

- 305.4 CONTRACT Successful bidders of Long Distance Championship Events shall sign a written contract with USMS, specifying the responsibilities of the meet host and of USMS, Inc.
- **305.5. FINANCIAL** The sponsoring organization must agree to underwrite the full meet expenses including but not limited to the following:
- .1 Costs associated with the meet (setting up the course, supplies, equipment, etc.).
- .2 Cost of National Championship Meet awards (medals and patches) and other supplemental awards.
- .3 A fee of \$3.00 per individual entrant in the meet, to be paid within seven days of the last day of acceptance of entries. Upon compliance with the conditions set forth in the Meet Contract, the sum of \$2.00 per entrant shall be returned as stipulated in the Contract. Noncompliance with said conditions, as determined by the meet evaluation committee within 30 days of the receipt of the final meet report, shall result in forfeiture of part or all of this amount.
- . 4 Costs reflected in National Championship Meet contracts.
- .5 Complete financial statements, which shall be forwarded to the Long Distance Committee Chairman within 60 days of the completion of the event.
- 305.6. ENTRY FEES The entry fees for Long Distance/Open Water National Championship Meets shall not exceed \$20.00 for individual events and \$5.00 per team member in team events. A surcharge may be added for swimmers in individual events, subject to the approval of the Chairman of the Long Distance Committee.

305.7. RULES OF CONDUCT

- .1 Meet Director The Meet Director shall follow the applicable swimming and long distance rules of USMS and the policies and procedures established by the Long Distance Committee with regard to the planning and execution of the requirements for a National Championship.
- .2 Entry Forms Entry forms shall be reviewed by the Long Distance Committee Chairman and the LMSC for content and sanctioning prior to distribution. Acceptable entry forms shall be sent to the Long Distance Chairman, all LMSCs, and the USMS National Office at least ninety (90) days prior to the first day of the meet.
- .3 Officials The Long Distance Committee shall appoint a Meet Advisor to aid the Meet Director and ensure that all rules are observed.

.4 Costume

A Swimmers' costumes must be non-transparent and conform to the current concept of the appropriate. The Referee shall have the authority to bar offenders from competition until they appear properly costumed. One

Page 72 PART THREE

- suit, goggles, ear plugs, and grease will be allowed. The suit shall be made of a porous material.
- B Swim cap(s), including those made of neoprene, may be permitted. Swim caps shall be defined as head gear conforming to a traditional swim cap design and shall not extend to protect the neck or shoulders.
- C Flotation aids and any devices used to maintain body heat are not allowed, except for those listed in Articles 305.7.4A and 305.7.4B. Wet suits or any similar costumes are not allowed.
- D Propulsive devices are not permitted.
- E Products involving tobacco, alcohol, or pharmaceuticals containing drugs banned under IOC or FINA rules may not be advertised, but the advertiser's name only may be used.

.5 Assistance During the Race

- A Feeding is permissible, but use of alcohol or illegal drugs is forbidden.
- B Paddlers and escort boats are authorized if approved by Meet Director.
- **305.8. RESULTS** Individual and team results and records shall be kept and submitted to the Long Distance Committee Chairman.
- .1 Results submitted to the committee must include the following information: finish places, times/distances, and each swimmer's full name (as it appears on the USMS registration card), age, sex, verified USMS registration number, LMSC of registry, and club affiliation.
- .2 Results shall also be mailed to the clubs represented at the National Championship Meet and shall include the following information: places, times/distances, swimmers' names, ages, and club affiliations.
- **305.9. CLUB SCORING** No club scores shall be officially tallied or recognized for National Long Distance/Open Water Championship events.

305.10. AWARDS

- .1 National Championship Meet medals, or other appropriate awards, approved by the Long Distance Committee chairman, shall be awarded at least to the first through third place winners of individual championships in each age group.
- .2 Scoring contestants on at least the first, second, and third place teams shall receive National Championship Meet medals.
- . 3 Trophies may be awarded to individuals and teams at the discretion of the Meet Director.
- .4 A USMS championship patch will be awarded to each individual champions and each scoring member of a championship team. An individual will receive only one patch per meet.

ARTICLE 306: ALL-AMERICAN RECOGNITION AND RECORDS

306.1. ALL-AMERICAN RECOGNITION - The national champion in each age group of each individual National Long Distance/Open Water Championship event shall qualify as a member of the USMS All-American Long Distance Swimming team for the calendar year in which the event was conducted.

306.2. RECORDS

- .1 National records will be maintained in the quarter-mile straightaway events (1-mile and 2-mile events) and time/distance events (1-hour, 6000-yard, and 10K postal pool events).
- .2 Record times must be swum in a sanctioned event and must be routed through the sanctioning body to the Long Distance Committee Chairman.
- .3 No national records will be maintained in open water events because of differences in courses, currents, and other physical factors.
- .4 When a record attempt has been timed to the nearest second, 99 hundredths of a second shall be added to the time submitted. When a record attempt has been timed to the nearest tenth of asecond, 9 hundredths of a second shall be added to the time submitted.

PART FOUR: ATHLETES' RIGHTS, HEARINGS, AND APPEALS

ARTICLE 401: ATHLETES' BILL OF RIGHTS

- **401.1. PROTECTION** USMS and its LMSCs shall respect and protect the right of every individual who is eligible and qualified to participate in events conducted in compliance with reasonable national and applicable international requirements, rules, and regulations.
- 401.2. RIGHT TO PARTICIPATE No member of USMS, nor any organization affiliated with USMS, may deny or threaten to deny any eligible individual the opportunity to participate in events sanctioned/recognized by USMS.
- 401.3. REPORTING Any individual who alleges that a right as set forth in Article 401.2 has been denied or is about to be denied, by a person or organization affiliated with USMS, shall immediately inform the Executive Secretary of USMS, who shall promptly cause an investigation to be made and steps to be taken to settle the controversy without unnecessary delay.

401.4. INVESTIGATION

- .1 Role of the Executive Secretary Whenever an individual, or party acting on an individual's behalf, informs the Executive Secretary of USMS of an alleged violation of rights as set forth in Article 401.2, the Executive Secretary, or any member of the Executive Committee of USMS appointed for this purpose by the President, shall review all the related evidence of the case and make a report, with a preliminary recommendation, to the Review Section within thirty (30) days or sooner if the situation requires.
- .2 Role of the Review Section The Review Section shall review the case and preliminary recommendation and take whatever action it deems appropriate. Any of the parties involved who are dissatisfied with the decision of the Review Section may appeal said decision under the provisions set forth in Article 403.1.

ARTICLE 402: REVIEW SECTION

402.1. COMPOSITION OF THE REVIEW SECTION

- .1 Members The Review Section shall be comprised of the Legal Counsel of USMS and each Zone Representative.
- .2 Chairman The President of USMS shall appoint the Chairman of the Review Section from among its members and shall designate a panel of no fewer than

three members, one of whom shall be the Zone Representative in whose Zone the alleged violation occurred, to hear and decide any case before the Review Section.

402.2. JURISDICTION AND AUTHORITY OF THE REVIEW SECTION

- .1 General Jurisdiction As hereinafter set forth, USMS, through the Review Section or any body assigned exclusive jurisdiction, has the authority to:
 - A Determine the eligiblity and right of any athlete to compete.
 - B Impose and enforce penalties, including censure, suspension, or expulsion from membership, for any violation of the rules and regulations of USMS or for actions which bring disrepute upon USMS or upon the sport of swimming.
 - C Interpret any provision of the rules and regulations of USMS with the exception of the swimming and long distance swimming rules.
 - D Vacate, modify, sustain, stay, or reverse any decision or order properly submitted for review, or remand the matter for further action.
 - E Investigate any election impropriety or cause for removal of a national committeeman or national officer and take corrective action.
 - F Issue such interim orders as may be necessary pending a final decision of any body granted exclusive jurisdiction.
 - G Review any exercise of the powers by another committee as provided in Article 402.2.2.

.2 Exclusive Jurisdiction

- A Upon a majority vote of the Review Section Panel assigned to a case, or upon a majority vote of the Review Section, an appropriate body within the LMSC in which the matter occurred may be assigned exclusive jurisdiction of any matter within the purview of Article 402, when the best interest of Masters Swimming will be served thereby.
- B Upon a majority vote of the USMS Board of Directors, or upon a two-thirds vote of the USMS House of Delegates, the USMS House of Delegates may be assigned exclusive jurisdiction of any matter within the purview of this Article, when the best interests of Masters Swimming will be served thereby.
- **402.3. PROCEDURES** The procedures to be taken in reference to all hearings shall be as follows:

.1 Formal Hearing

A The respondent shall be given notice in writing by certified mail, return receipt requested, to the last known address, or by personal service, detailing the charges or the circumstances which are believed to require answers, explanation, or clarification.

Page 76 PART FOUR

- B The written statement of charges shall also contain:
 - The penalties which may ensue if such charges are proved.
 - A date at which time a hearing will be held, with the request that the person charged appear before the Review Section Panel, with the right to have personal counsel represent him at the hearing.
 - 3. A stated date of not less than thirty (30) days nor more than sixty (60) days after the date of mailing of such notification.
 - 4. A request that the person charged answer in writing to the chairman of the Review Section Panel all the charges set forth in such written statement.
 - A request that this written answer be delivered by certified mail, return receipt requested, no later than ten (10) days prior to the date of the hearing.
- C The decision shall be rendered at the time of the hearing, or within twentyfour (24) hours thereafter.

ARTICLE 403: APPEAL

403.1. APPEAL PROCEDURES - The decision of the Review Section shall be final in all cases, subject only to appeal to the Board of Directors of USMS, and thereafter to the USMS House of Delegates. An appeal to either body must be taken within twenty (20) days after mailing of written notice of the decision to be appealed. Upon timely petition to the President of USMS, and upon showing of good cause therefore, the time for appeal from a decision may be extended. The chairman of the body to which a decision is appealed shall set a date for appellate hearing not less than thirty (30) days after receipt of the notice of appeal, nor after the next regularly scheduled meeting of that body that occurs thirty days or more after said receipt. The appeal decision, including findings of fact, shall be reduced to writing and mailed by certified or registered mail to all parties within ten (10) days of hearing. Any person representing a real party in interest in the case may appeal.

PART FIVE: UNITED STATES MASTERS SWIMMING, INC. ORGANIZATION AND BYLAWS

ARTICLE 501: MEMBERSHIP

- 501.1. MEMBERSHIP CATEGORIES The membership of United States Masters Swimming, Inc., hereinafter sometimes referred to as the Corporation, shall consist of:
- .1 Club members, which are swimming clubs for Masters swimmers. Every swimming club which competes in Masters Swimming competition sponsored by the Corporation shall register with the Corporation through its respective LMSC.
- .2 Individual members, who register with the Corporation through an LMSC.
- .3 Any organization which is interested in swimming on either the national or local level. The House of Delegates may establish classes for such membership.
- **501.2. MANDATORY MEMBERSHIPS** All members of the House of Delegates and Board of Directors and all members of any committee of the Corporation must hold an individual membership in the Corporation.
- 501.3. EQUAL OPPORTUNITY Membership in the Corporation shall not be denied by virtue of race, creed, sex, religion, political affiliation, disability, or national origin.

ARTICLE 502: LOCAL MASTERS SWIMMING COMMITTEE (LMSC)

- **502.1. LMSC MEMBERSHIP** Each LMSC shall consist of individual members and club members currently registered through that LMSC.
- 502.2. BYLAWS Each LMSC shall be governed by bylaws which are consistent with USMS objectives and goals.
- **502.3. ANNUAL MEETING** Each LMSC shall hold an annual meeting open to all individual members registered with USMS through the LMSC.
- **502.4. ELECTION OF OFFICERS** Each LMSC shall provide for periodic election of officers in its bylaws.
- **502.5. FILING OF BYLAWS** Each LMSC shall file a copy of its current bylaws with the USMS National Office.

- **502.6. BOUNDARY DESCRIPTIONS** Appendix D contains official boundary descriptions for each LMSC.
- 502.7. RECORDS AND RECORD KEEPING Each LMSC shall comply with the financial record keeping and reporting requirements of USMS. The secretary shall forward to the USMS National Office a copy of the minutes of the annual meeting and a copy of the LMSC's annual financial reports.

ARTICLE 503: HOUSE OF DELEGATES

- **503.1. MEMBERSHIP** The House of Delegates of the Corporation shall consist of the following:
- .1 One member from each LMSC. If the LMSC has over 300 annual registrations, it is entitled to one additional member. For each additional 500 annual registrations, the LMSC is entitled to one more member in the House of Delegates. Figures shall be determined by the records of the National Registrar for the previous year or June 15th of the current year, whichever is the greater.
- .2 All members of the Executive Committee.
- .3 All members of the Zone Committee.
- .4 All members of the Rules, Legislation, and Long Distance Committees, the Controller, and the Chairmen of all standing committees appointed by the President shall be at-large members, if not already members.
- .5 The President of the Corporation shall be empowered to appoint up to ten percent of the total membership of the House of Delegates as at-large members of the House of Delegates.
- .6 All members of the House of Delegates shall remain until their successors are selected, except that membership may be terminated by resignation filed with the Secretary.
- **503.2.** POWERS The powers of the House of Delegates shall be as follows:
- .1 To admit to group membership or individual membership any organization or person eligible under this Code and who applies.
- . 2 To prescribe and amend the Code for the government of the Corporation.
- .3 To impose and enforce penalties for any violation of the Code of the Corporation.
- . 4 To call regular and special meetings of the Corporation and to fix the time and place for holding all meetings not fixed by this Code.
- . 5 To collect the dues and/or funds of the Corporation and to expend the same.
- . 6 To institute, locate, conduct, and manage all National Championship Meets.

.7 To explain, define, and interpret any provisions of this Code or other rules of the Corporation, including the rules of competition.

503.3. MEETINGS OF THE HOUSE OF DELEGATES

- .1 The annual meeting of the House of Delegates shall be held at such time and place, within or without the State of Ohio, as may be fixed in the notice of such meeting.
- .2 Special meetings of the House of Delegates may be held at any time, pursuant to a resolution of either the Board of Directors or the House of Delegates.
- .3 A written notice of all annual and special meetings of the House of Delegates, stating the time, place, and preliminary agenda, shall be given to each member of the House of Delegates by mailing the same to each member's last known address at least three (3) weeks prior to the meeting date.
- .4 Each member of the House of Delegates shall have one vote on each matter submitted to the House of Delegates of the Corporation for his vote, consent, waiver, release, or other action. There shall be no voting by proxy.
- .5 A quorum shall consist of those members of the House of Delegates present and voting.

ARTICLE 504:

504.1. POSITIONS - The elected officers of the Corporation shall be a President, a Vice-President, a Secretary, and a Treasurer. No person may concurrently hold more than one such office.

504.2. ELECTIONS AND TERM OF OFFICE

- .1 All officers of the Corporation shall be elected by the members of the House of Delegates at annual meetings held in odd-numbered years. Elected officers shall hold office for two years or until their successors are elected and qualified.
- .2 Each officer is eligible for election to the same office for two terms. No person so elected for two successive terms is eligible for re-election to the same office until after the lapse of two years following the terms of office to which that person was last elected.
- 504.3. VACANCIES Vacancies in any office of the Corporation may be filled for the unexpired term by the Board of Directors at any meeting of the Board of Directors.
- 504.4. DUTIES OF OFFICERS The duties of the officers shall be as follows:
- . 1 The President shall:

Page 80 PART FIVE

- A Order meetings of the Corporation as provided in the Code and preside at all meetings of the Corporation.
- B Exercise all the duties pertaining to this office in accordance with the Code.
- C Serve as an ex-officio member of all committees.
- D Appoint Legal Counsel who shall serve at the pleasure of the President.
- .2 The Vice-President has duties as assigned by the President and has all the powers and performs the duties of the President should the President be unable or incapable of performing such duties.
- .3 The Secretary shall make proper arrangements to:
 - A Keep the records of the Corporation and the House of Delegates.
 - B Conduct all official correspondence of the Corporation.
 - C Issue all official notices of all meetings of the House of Delegates and Board of Directors.
 - D Serve as Secretary of the House of Delegates and the Board of Directors.
- .4 The Treasurer shall:
 - A Be the custodian of all Corporate funds.
 - B Receive all funds of the Corporation and deposit to the accounts of the Corporation.
 - C Disburse funds as directed by the Controller, or by the House of Delegates.
 - D Invest funds of the Corporation in a prudent manner for the benefit of the Corporation, in accordance with the investment policies established by the Finance Committee.
 - E Maintain adequate and accurate financial records which document the income and disbursement of the Corporation's funds.
 - F Submit all financial records to the Internal Audit Committee annually within one month following the end of the Corporation's fiscal year.

ARTICLE 505: BOARD OF DIRECTORS

- **505.1. MEMBERSHIP** The Board of Directors of this Corporation shall consist of:
- .1 The President, the Vice-President, the Secretary, and the Treasurer.
- .2 Each member of the Zone Committee.
- .3 Past Presidents not already on the Board.
- . 4 The Chairmen of all Standing Committees.

- .5 The Legal Counsel.
- . 6 The Controller.
- .7 An ex-officio member from United States Swimming.
- **505.2. TERM OF OFFICE** Directors shall be elected or appointed for a two year term.
- **505.3. MEMBERSHIP REQUIREMENTS** The Board of Directors of the Corporation shall at all times be composed of individuals, of whom at least 80 percent are active Masters swimmers in the United States.
- 505.4. VACANCIES Any vacancies that may occur on the Board of Directors, except vacancies in the Officers, caused by death, resignation, or otherwise, shall be filled for the unexpired term by someone appointed by the President from among the members of the House of Delegates.
- **505.5. POWERS** The Board of Directors shall have the authority to act for the Corporation between meetings of the House of Delegates.
- 505.6. MEETINGS Meetings of the Board of Directors shall be held at any time or place, within or without the State of Ohio, pursuant to a resolution of the Board of Directors or to a call signed by the President or any three Directors. Two (2) weeks' written notice of such meeting shall be given to each Director. Notice of any meeting may be waived in writing before such meeting. Special matters may be voted upon by the Board of Directors by mail, but no action can thus be taken without the endorsement of a majority of all Directors.
- **505.7. QUORUM** The presence of a majority of the Directors shall constitute a quorum at any meeting of the Board of Directors.
- 505.8. VOTING PRIVILEGES Each member of the Board of Directors shall have one vote with the exception of the Past Presidents. The Immediate Past President shall have one vote and all other Past Presidents shall be ex-officio members. Ex-officio members shall have voice but no vote.

ARTICLE 506: COMMITTEES

506.1. EXECUTIVE COMMITTEE

- .1 The Executive Committee of this Corporation shall consist of:
 - A The President, the Vice-President, the Secretary, and the Treasurer.
 - B The Zone Committee Chairman.
 - C The Legal Counsel.
 - D The immediate Past President.

Page 82 PART FIVE

- .2 The Executive Committee shall have the authority to act for the Corporation between meetings of the Board of Directors.
- 506.2. STANDING COMMITTEES Whenever possible, each committee shall have representation from each zone. The terms of all committee chairmen shall coincide with that of the President.
- the Chairman appointed by the President for a two year term and one member from each zone, a representative of the Sports Medicine Committee, and any other members the Chairman shall deem necessary to carry out the work of the Committee. At least two members of the Committee shall not have experience in the direction of National Championship Meets. Duties of the Committee include receiving bid proposals for National Championship Meets, coordinating the date and site with other national swimming championships, reviewing the bids, and making recommendations to the House of Delegates to assist the selection process. In addition, the Championship Committee shall serve in an advisory capacity to the winners of the bids for each championship and shall endeavor to maintain a consistent approach to the running of all National Championship Meets, including the production of pre-meet and post-meet literature and results.
- .2 Coaches Committee The Coaches Committee shall consist of a Chairman appointed by the President for a two year term and as many members as the Chairman shall deem necessary to carry out the duties of the Committee, including appropriate activities at National Championship Meets. These members shall be appointed by the Chairman with the concurrence of the President. The standing purpose of the Committee is to promote Masters Swimming from an organizational standpoint in the conduct of Masters Swimming workouts as well as to assist in the organizational aspects of National Championship Meets by providing leadership and personnel for approved programs and projects. The Coaches Committee may serve in an advisory capacity to the Executive Committee and to other committees concerning those items that would affect the coaching of Masters Swimming and the promotion of organized programs for Masters Swimming.
- .3 Convention Committee The Convention Committee shall consist of the Chairman appointed by the President for a two year term. The Chairman shall choose, with the concurrence of the President, as many members as needed to carry out the duties of the Committee. The Committee shall coordinate with United States Aquatic Sports, Inc., in the preparation of each year's national convention and carry out the operational needs of the House of Delegates and its committees at that convention.
- .4 Finance Committee The Finance Committee shall consist of the Chairman appointed by the President for a two year term. The Chairman shall choose from the House of Delegates nine members, with at least one from each zone. The Treasurer, the Chairman of the Internal Audit Committee, and the Controller shall serve as ex-officio members of the Committee.
 - A The Finance Committee shall:

- Develop policies pertaining to the financial affairs of the Corporation.
- Receive and review the annual reports of the Internal Audit Committee, Treasurer, and Controller.
- Prepare or cause to be prepared a summary of the above reports to be presented to the House of Delegates at each annual convention.
- Annually receive and compile all budget requests from each Officer and Committee for the next fiscal year.
- At each annual convention, prepare the Corporation's budget for the next fiscal period and, after approval of the Budget by the Committee, submit same to the House of Delegates for approval.
- Report to the Board of Directors.
- B Committee requests for budget items or requests for funding that are disapproved by the Finance Committee (or those not submitted to the Finance Committee) may be approved by the House of Delegates by a two-thirds vote.
- .5 Fitness Committee The Fitness Committee shall consist of the Chairman appointed by the President for a two year term and other members selected by the Chairman, with the concurrence of the President, as may be appropriate to carry out the duties of the Committee. The Committee shall study and develop fitness swimming activities for the general membership at the national level, and encourage such activities a the local level. The Committee shall educate adults on the fitness benefits of swimming.
- .6 Insurance Committee The Insurance Committee shall consist of the Chairman appointed by the President for a two year term and other members selected by the Chairman as may be necessary to carry out the duties of the Committee. The Committee shall study and review the insurance needs of USMS and shall recommend policies, procedures, and appropriate insurance coverage for USMS, its participants, and its programs.
- .7 Internal Audit Committee The Internal Audit Committee shall consist of at least two members of the Corporation appointed by the President with the concurrence of the Board of Directors, one of whom shall be designated by the President as Chairman. The members of the Committee shall serve at the pleasure of the President and shall make their reports to the House of Delegates through the Finance Committee. The Internal Audit Committee shall:
 - A Receive the financial records of the Corporation from the Treasurer and the Controller.
 - B Examine at least annually all financial records received pursuant to Article 506.2.7A to determine the accuracy and validity of the records maintained by the Treasurer and Controller.

Page 84 PART FIVE

- C Prepare and audit the annual income statement and balance sheet of the Corporation, along with any other appropriate financial statements as of the close of the Corporation's fiscal year.
- D Present the financial statements listed in Article 506.2.7C to the Finance Committee as soon as practical after the close of the fiscal year with a statement as to the Internal Audit Committee's position regarding the accuracy and validity of those documents.
- E Submit to the Finance Committee recommendations for the improvement of the financial management of the Corporation.
- F Receive reimbursement for expenses incurred in the performance of its duties, following authorization by an Officer or the Chairman of the Finance Committee.
- .8 International Committee The International Committee shall consist of the Chairman appointed by the President for a two year term and other members as may be appropriate. The Committee will encourage, promote, and coordinate Masters Swimming on an international basis, and shall be empowered to bid for international championship meets.
- .9 Legislation Committee The Legislation Committee Chairman shall be appointed by the President for a two year term. The Chairman shall choose from the House of Delegates two members from each zone. The Legislation Committee is charged with considering all Code change proposals of an administrative or organizational nature and maintaining consistency within the Code of Regulations. The Legislation Committee may initiate and shall consider proposed amendments submitted to the Committee in writing and in proper form in accordance with the provisions of Part Six, Amendment Procedures.
- .10 Long Distance Committee The Long Distance Committee Chairman shall be appointed by the President for a two year term. The Chairman shall choose from the House of Delegates twelve members, with at least one member from each zone. The Chairman will be the USMS liaison to the USS Long Distance Committee. The Long Distance Committee may initiate and shall consider proposed amendments to Part Three of the Rules of Competition and shall present them to the House of Delegates with recommendations.
- .11 Marketing/Publications Committee The Marketing/Publications Committee shall consist of a Chairman appointed by the President for a two year term and other members as necessary to carry out the appropriate duties. The Committee shall define the marketing and communications goals and objectives, which are supportive of the purpose and philosophy of Masters Swimming, and will execute the activities and produce materials necessary to accomplish these goals and objectives.
- .12 Planning Committee The Planning Committee shall consist of the Chairman appointed by the President for a two year term, one member from each zone, and other members as may be appropriate, who represent a broad range of experience in all aspects of the Masters Swimming program. The

Committee shall develop long range plans, goals, and objectives related to the vitality and quality of the Masters Swimming program and shall recommend appropriate projects, policies, and priorities in response to issues which affect USMS programs. In addition, the Committee shall conduct periodic reviews of the organizational structure and, when appropriate, shall suggest changes designed to enhance communications, efficiency, and productivity.

- .13 Records and Tabulation Committee The Records and Tabulation Committee shall consist of the Chairman appointed by the President for a two year term. The Chairman shall choose from the House of Delegates as many members as necessary to carry out the duties of the Committee. The duties of this Committee are to establish and maintain a standardized process of recording and verifying times and publishing the Top Ten Times and USMS National Records annually for each course.
- .14 Registration Committee The Registration Committee shall consist of the Chairman appointed by the President for a two year term, one member from each zone, and one member-at-large. Duties of the Committee include preparing regulations and fees for presentation to the House of Delegates.
- .15 Rule Book Committee The Rule Book Committee Chairman shall be appointed by the President for a two year term. With the concurrence of the President, the Chairman shall choose from the House of Delegates other members as necessary to carry out the duties. The Rule Book Committee shall be responsible for budgeting, planning, designing, editing, producing, and distributing the USMS Rule Book as approved by the House of Delegates.
- .16 Rules Committee The Rules Committee Chairman shall be appointed by the President for a two year term. The Chairman shall choose from the House of Delegates ten members with at least one member from each zone. The Rules Committee recommends to the House of Delegates at its annual meeting rule changes for the improvement of the sport. Such recommendations shall be based on proposals submitted to the Rules Committee in writing and in the proper form in accordance with the provisions of Part Six, Amendment Procedures.
- .17 Sports Medicine, Health and Safety Committee The Sports Medicine, Health, and Safety Committee shall consist of the Chairman appointed by the President for a two year term and other members as necessary to carry out the appropriate duties. The Committee shall research and advise USMS on subjects related to sports medicine, health, and safety. The Committee shall also stimulate and encourage research in the health benefits, medical problems, physiology, and psychology of Masters Swimming.
- .18 Zone Committee The Zone Committee shall consist of a representative from each zone elected by the members of the House of Delegates from each LMSC in each zone at the annual meeting of the House of Delegates for a two year term. Zone representatives shall be residents of their zones, and a change of residency by a Zone Representative out of the zone shall cause a vacancy. In the event a vacancy exists, the President shall appoint a member of the zone to fill the unexpired term. The Zone Representatives shall select

Page 86 PART FIVE

the Chairman of the Committee from within or without the Committee. The Committee shall carry out the responsibilities assigned to it by the policies of the House of Delegates, the President, the USMS Code of Regulations, and the stated need of the LMSCs.

The Zone Committee will canvass qualified and interested persons and present one or more candidates for each of the four officer positions at least one month before the annual meeting. Additional candidates may be nominated at the Annual Meeting with the requirement that each nomination is made by at least two members of the House of Delegates and provided the nominee(s) gives written consent. The Zone Committee shall recommend a structure for the election of officers.

506.3. AD HOC COMMITTEES - The President may establish other committees on an ad hoc basis which are deemed necessary to carry out the duties of the President. Each committee shall meet annually in conjunction with the annual meeting of the House of Delegates, if requested by the committee chairman, a committee member, or any member of the House of Delegates.

ARTICLE 507: FINANCIAL POLICY

- **507.1. FISCAL YEAR** The Corporation shall have a one-year fiscal period for tax and accounting purposes commencing on the first day of January.
- 507.2. CONTROLLER The Controller shall be appointed by and serve at the pleasure of the President and shall report to the Finance Committee. The Controller shall:
- .1 Establish and maintain the financial records of the Corporation using generally accepted accounting principles and practices.
- .2 Record corporate income from the Registrar and all other sources on the books of the Corporation.
- .3 Receive and record all invoices and/or bills, which invoice and/or bills shall have been approved by an Officer or Committee Chairman or other person authorized to approve such expenses.
- .4 Authorize the Treasurer to disburse corporate funds pursuant to paragraph .3 above.
- . 5 Prepare annual financial summaries of the Corporation's financial status within two months following the end of the fiscal year.
- .6 Prepare the annual financial reports showing the income and disbursements of the Corporation, which shall be similar to those reports required of nonprofit organizations by Section 6056 of the Internal Revenue Code of 1954 (or corresponding provisions of any subsequent tax laws). Such annual financial reports shall be made available for inspection by members of the general public

- at the Corporation's principal office on request made within 180 days after notice of its availability.
- .7 Prepare the Corporation's annual tax returns.
- .8 Submit all financial records to the Internal Audit Committee annually within two months following the end of the fiscal year.
- .9 Submit recommendations for improvements in the management of the Corporation's fiscal affairs to the Chairman of the Finance Committee as requested or deemed advisable.
- .10 The Controller shall be reimbursed for expenses incurred in the performance of the duties of the position, following authorization by an Officer or the Chairman of the Finance Committee.
- 507.3. FEES Fees shall be as established by the House of Delegates.

ARTICLE 508: INDEMNIFICATION AND DISSOLUTION

508.1. INDEMNIFICATION

- .1 Each person who is or was a Director, officer, or employee of the Corporation (including the heirs, executors, administrators, or estate of such person) shall be indemnified by the Corporation to the full extent permitted by the Nonprofit Corporation Law of the State of Ohio against any liability cost or expense incurred by him in his capacity as director, officer, or employee, or arising out of his status as a Director, officer, or employee (including serving at the request of the Corporation as a director, trustee, officer, employee, or agent of another corporation).
- .2 The Corporation may maintain insurance, at its expense, to protect itself and any such person against any such liability, cost, or expense. For the purpose of Article 508.1, references to "the Corporation" include all constituents absorbed in a consolidation or merger as well as the resulting or surviving corporation.

508.2. DISSOLUTION

- .1 If deemed advisable by the members, the Corporation may be dissolved pursuant to the applicable provision of the Corporation laws of the State of Ohio.
- .2 Upon the dissolution of the Corporation, the Board of Directors shall, after paying or making provision for the payment of all the liabilities of the Corporation, dispose of all the assets of the Corporation exclusively for the purposes of the Corporation or to such organization or organizations organized and operated exclusively for charitable, educational, religious, literary, or scientific purposes as shall qualify as exempt organizations under Section 501(c)(3) of the Internal Revenue Code of 1954 (or the corresponding provision of any future United States Internal Revenue Law).

PART SIX: AMENDMENT PROCEDURES

ARTICLE 601: AMENDMENTS

601.1. COMMITTEE JURISDICTION

- .1 Rules Proposed changes to the Rules for Competition (Part One) and the Glossary shall be considered by the Rules Committee for report and recommendation to the House of Delegates.
- .2 Long Distance Proposed changes to the Rules for Long Distance Swimming (Part Three) and the Glossary shall be considered by the Long Distance Committee for report and recommendation to the House of Delegates.
- .3 Legislation Proposed changes to the Code of Regulations (Preamble, Goals and Objectives, Glossary, Part Two, Part Four, Part Five, Part Six, and Appendix D LMSC and Zone Boundaries) shall be considered by the Legislation Committee for report and recommendation to the House of Delegates.
- .4 Executive Committee Proposed changes to all other sections of the USMS Code of Regulations and Rules of Competition shall be considered by the Executive Committee or committee designated by the President. Such proposals are not subject to the provisions of Articles 601.2, 601.3, 601.4, and 601.5.

601.2. SUBMISSION OF PROPOSED AMENDMENTS

- .1 Authorization Changes to the USMS Code of Regulations and Rules of Competition may be proposed only by an LMSC, a standing committee of the House of Delegates, the Board of Directors, or the Executive Committee.
- .2 Format Proposed changes shall be in such form as to show the entire section as it will read if adopted, with any changes in language underlined if new and lined out if deleted.
- .3 Submission Deadline Proposed changes by an LMSC must be submitted to the Chairman of the Rules, Legislation, or Long Distance Committee not later than July 10.
- .4 Publication of Proposed Amendments All proposed changes to the Rules or Code shall be published and mailed to each LMSC and each member of the House of Delegates not later than August 15.
- 601.3. MODIFICATION OF PROPOSED AMENDMENTS Proposed amendments may be modified in any manner by the Rules, Legislation, or Long Distance Committee, where appropriate, while under consideration by said Committee. Such modification must be germane to the subject matter and intent of the proposed change.

- 601.4 ADOPTION OF PROPOSED AMENDMENTS The USMS Code of Regulations and Rules of Competition may only be altered, amended, repealed, or otherwise changed at the annual meeting of the House of Delegates and only as follows:
- .1 Rules In even-numbered years, Part One and the Glossary may be amended by a majority vote of the House of Delegates members present and voting, if submitted to and reported out favorably by the Rules Committee, or by a twothirds vote of the House of Delegates members present and voting if submitted to and NOT reported out favorably by the Rules Committee.
- .2 Long Distance In even-numbered years, Part Three and the Glossary may be amended by a majority vote of the House of Delegates members present and voting if submitted to and reported out favorably by the Long Distance Committee, or by a two-thirds vote of the House of Delegates members present and voting if submitted to and NOT reported out favorably by the Long Distance Committee.
- .3 Legislation In odd-numbered years, the Preamble, Goals and Objectives, Glossary, Part Two, Part Four, Part Five, Part Six, and Appendix D LMSC and Zone Boundaries may be amended by a majority vote of the House of Delegates present and voting if submitted to and reported out favorably by the Legislation Committee, or by a two-thirds vote of the House of Delegates members present and voting if submitted to and NOT reported out favorably by the Legislation Committee.
- .4 Emergency Amendments Emergency amendments may be passed by a nine-tenths vote of the House of Delegates members present and voting if they are not submitted in conformity with Articles 601.4.1, 601.4.2, and 601.4.3, and only if properly submitted to, deemed an emergency, and reported out favorably by the appropriate governing committee as defined in Article 601.1.

.5 USS Amendments Which Affect USMS Rules

- A Amendments to USS Articles 101, "Individual Strokes and Relays," and 102, "Conduct and Officiating of All Swimming Competition," shall automatically be adopted by USMS, unless the USMS House of Delegates votes to reject those amendments.
- B If amendments to USS Articles 101 and 102 are adopted between the annual meetings of the House of Delegates, the corresponding portions of Part One shall automatically be adopted by USMS, except that such amendments may be altered, amended, repealed, or changed by a ninetenths vote of the Rules Committee and a majority vote of the Executive Committee.
- 601.5 EFFECTIVE DATE Unless otherwise specified, all changes approved as prescribed shall become effective on January 1 of the year following their adoption.

Summary of Amendment Procedures	Even Years	Odd Years
Rules (Part One and Glossary) If reported out favorably by committee If NOT reported out favorably by committee	Majority 2/3	*
Long Distance (Part Three and Glossary) If reported out favorably by committee If NOT reported out favorably by committee	Majority 2/3	*
Legislation (Preamble, Goals and Objectives, Glossary, Part Two, Part Four, Part Five, Part Six, and Appendix D) If reported out favorably by committee If NOT reported out favorably by committee		Majority 2/3

^{*}Emergency Amendments: by a 9/10 vote ONLY if properly submitted, deemed an emergency, and reported out favorably by the appropriate committee.

APPENDIX A

RECORDS

Category	Current as of
USMS Short Course Yards	May 31, 1993
USMS Short Course Meters	November 1, 1993
USMS Long Course Meters	September 15, 1993
World Short Course Meters	November 1, 1993
World Long Course Meters	November 1, 1993
USMS Long Distance	November 1, 1993

EFFECTIVE DATES: The records in this listing reflect applications received by the above effective dates. Some records achieved by these effective dates may not yet have been submitted or processed.

DISCREPANCIES AND ERRATA: The USMS record is faster than the world record in some events. Possible reasons for these discrepancies include: (a) the application for the USMS record has been approved, but the application for the world record still is in progress; (b) a birth certificate was not submitted as proof-of-age; (c) certification of pool length was not submitted; or (d) the application for the world record was not submitted within six months of the date of the performance.

CORRECTIONS: Any questions about the listed records should be addressed to:

"Pool" Records	Long Distance Records
Walter Reid	Sally Dillon
Records/Tabulation Committee	Long Distance Committee
P.O. Box 8800A	P. O. Box 9499
Steilacoom, WA 98388	Truckee, CA 96162

50 Free S Miller 1991 :23.97 M Chow 1993 :27.54 D Dutcher 1992 :27.94
Document Document
400/500 free D Graner 1989 5:04.90 L Dial 1992 4:43.50 4:40.00 C Hinshaw 1992 4:40.07 4:40.07 C Hinshaw 800/1000 free M Pack 1992 10:41.76 C Planje 1992 10:00.67 C Hinshaw 1992 9:54.84 9:50.00 C Hinshaw 1500/1650 free K Burton 1987 17:31.70 K Henson 1990 18:54.01 C Hinshaw 1992 18:37.22 18:37.22 19:30 10:00.60 C Hinshaw 1992 18:37.22 18:37.22 19:00.60 C Hinshaw 1992 18:37.22 18:37.22 T Smith 1990 13:155 19:00.60 T Smith 1990 13:155 19:00.60 T Smith 1990 19:31.55 19:00.60 T Smith 1990 19:00.60 T Smith 1990 19:00.60 T Smith 1990 19:00.60 T Smith 1992 1:16.00 T Smith 1993 1:16.00 T Smith 1992 1:16.00 T Smith 1993 1:16.00 T Smith 1994 1:16.00 T Smith
None
1500/1650 free K Burton 1987 17:31.70 K Henson 1990 18:54.01 C Hinshaw 1992 18:37.22 1990 100 back D Risen 1990
50 back D Risen 1990 :27.85 N Wengrofsky 1990 :33.30 T Smith 1990 :31.55 N Wengrofsky 1980 1:12.40 D Braciak 1987 1:06.09 200 breast S Mortenson 1993 :30.25 P Urbas 1992 :36.05 T McFarlane 1991 :35.22 N M M M M M M M M M M M M M M M M M M
100 back D Risen 1990 157.96 C Hartzell 1989 1:12.40 D Braciak 1987 1:06.09
200 back S Burt 1993 2:06.90 C Hartzell 1988 2:34.32 M Donahue 1992 2:26.62 50 breast S Mortenson 1993 :30.25 P Urbas 1992 :36.05 T McFarlane 1991 :35.22 100 breast S Mortenson 1993 :106.74 S Costa 1992 1:19.97 T McFarlane 1991 1:18.44 200 breast A Tweedy 1987 2:25.40 S Costa 1992 2:50.30 L Keogh 1993 2:51.20 50 fly S Miller 1991 :26.59 M Chow 1993 :29.66 S Smilley 1993 :30.03 100 fly S Miller 1991 :57.39 S Turek 1990 1:07.42 B Castillo 1988 1:06.05 200 fly S Turek 1991 :59.21 M Chow 1993 1:09.25 2:34.28 B Castillo 1988 2:22.59 2:20 lM S Miller 1991 :59.21 M Chow 1993 1:09.25 2:34.20 M Donahue 1992 2:29.90 400 lM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1987 5:20.39
50 breast S Mortenson 1993 :30.25 P Urbas 1992 :36.05 :36.05 T McFarlane T McFarlane 1991 :35.22 :35.22 :35.22 :30.05 T McFarlane 100 breast S Mortenson 1993 1:06.74 S Costa 1992 2:50.30 L Keogh 1993 2:51.20 :25.20 .25.00 L Keogh 1993 2:51.20 .25.20 .25.00 L Keogh 1993 2:51.20 .25.20 .25.00 L Keogh 1993 2:51.20 .25.20 .25.00 .25.20 .25.00 .25.20 .25.00 .25.20 .25.
100 breast S Mortenson 1993 1:06.74 S Costa 1992 1:19.97 T McFarlane 1991 1:18.44
200 breast A Tweedy 1987 2:25.40 S Costa 1992 2:50.30 L Keogh 1993 2:51.20 50 fty S Miller 1991 :26.59 M Chow 1993 :29.66 S Smiley 1993 :30.03 100 fty S Miller 1991 :57.39 S Turek 1990 1:07.42 B Castillo 1988 1:06.05 200 fty S Turek 1991 :59.21 M Chow 1993 1:09.25 200 lM S Miller 1991 :59.21 M Chow 1993 1:09.25 200 lM S Miller 1991 2:08.74 L Dial 1992 2:34.20 M Donahue 1992 2:29.90 400 lM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1987 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS World 50 free A
50 fly S Miller 1991 :26.59 M Chow 1993 :29.66 S Smiley 1993 :30.03 100 fly S Miller 1991 :57.39 S Turek 1990 1:07.42 B Castillo 1988 1:06.05 200 fly S Turek 1991 :211.03 C Planje 1991 2:34.28 B Castillo 1988 2:22.59 100 lM S Miller 1991 :59.21 M Chow 1993 1:09.25 200 lM S Miller 1991 2:08.74 L Dial 1992 2:34.20 M Donahue 1992 2:29.90 400 lM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1987 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS World 50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 S Shand 1991 :58.23 :58.23
100 ffy S Miller 1991 :57.39 S Turek 1990 1:07.42 B Castillo 1988 1:06.05 200 ffy S Turek 1991 2:11.03 C Planje 1991 2:34.28 B Castillo 1988 2:22.59 100 IM S Miller 1991 :59.21 M Chow 1993 1:09.25 200 IM S Miller 1991 2:08.74 L Dial 1992 2:34.20 M Donahue 1992 2:29.90 400 IM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1987 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS
200 ffy S Turek 1991 2:11.03 C Planje 1991 2:34.28 B Castillo 1988 2:22.59 100 IM S Miller 1991 :59.21 M Chow 1993 1:09.25 M Donahue 1992 2:29.90 200 IM S Miller 1991 2:08.74 L Dial 1992 2:34.20 M Donahue 1992 2:29.90 400 IM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1987 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS World 50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 S Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand </td
100 IM S Miller 1991 :59.21 M Chow 1993 1:09.25 200 IM S Miller 1991 2:08.74 L Dial 1992 2:34.20 M Donahue 1992 2:29.90 400 IM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1997 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS World 50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 S Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 :206.47 2:05.80 S Shand 1998 :207.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.
200 IM 400 IM S Miller N Stauffer 1991 1988 2:08.74 4:45.34 L Dial 1992 1992 2:34.20 5:21.53 M Donahue D Ursin 1992 1987 2:29.90 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World U.C-Meters Year USMS World World 50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 S Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 2:06.47 2:05.80 S Shand 1998 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.12 2:07.11 2:07.11 </td
400 IM N Stauffer 1988 4:45.34 L Dial 1992 5:21.53 D Ursin 1987 5:20.39 WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS World LC-Meters 50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 S Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 2:06.47 2:05.80 S Shand 1989 2:07.11 2:07.11 2:07.11 2:07.11 4:07.53 4:25.94 S Shand 1989 4:27.53 4:27.53 4:27.53 800/1000 free K Burton 1991 10:17.82 D Graner 1990 9:18.99 9:18.99 S Shand 1989 19:8.43 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 17:38.78 17:30.78
WOMEN 25-29 SC-Yards Year USMS SC-Meters Year USMS World LC-Meters Year USMS World 50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1999 :26.93 :26.93 S Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 2:06.47 2:05.80 S Shand 1989 2:07.11 2:07.11 2:07.11 4:07.53 4:27.53 4:27.53 4:27.53 4:27.53 4:27.53 4:27.53 4:27.53 8:00/1000 free K Burton 1991 10:17.82 D Graner 1990 9:18.99 9:18.99 S Shand 1999 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 9:18.43 17:30.18 A Pope 1988 17:38.78 17:38.78
50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 :Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 :206.47 2:05.80 S Shand 1998 2:07.11
50 free A Pettis-Scott 1992 :23.20 L Fabrizio 1989 :26.93 :26.93 :Shand 1991 :26.68 :26.68 100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 :206.47 2:05.80 S Shand 1998 2:07.11
100 free S Shand 1993 :51.07 L Fabrizio 1989 :59.17 :58.93 S Shand 1991 :58.23 :58.23 200 free S Shand 1993 1:51.53 D Graner 1989 2:06.47 2:05.80 S Shand 1989 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 2:07.11 8:07.00 1989 4:27.53 4:27.53 4:27.53 4:27.53 4:27.53 4:27.53 4:27.53 8:27.53 4:27.53 4:27.53 4:27.53 4:27.53 5:8.40 1989 4:27.53
200 free S Shand 1993 1:51.53 D Graner 1989 2:06.47 2:05.80 S Shand 1989 2:07.11 2:07.11 400/500 free K Burton 1991 4:56.18 D Graner 1989 4:26.18 4:25.94 S Shand 1989 4:27.53 4:27.53 800/1000 free K Burton 1991 10:17.82 D Graner 1990 9:18.99 9:18.99 S Shand 1989 9:18.43 9:18.43 1500/1650 free K Burton 1991 16:50.17 K Burton 1991 17:30.18 17:30.18 A Pope 1988 17:38.78
400/500 free K Burton 1991 4:56.18 D Graner 1989 4:26.18 d 4:25.94 S Shand 1989 4:27.53 d 4:27.53
800/1000 free K Burton 1991 10:17.82 D Graner 1990 9:18.99 9:18.99 9:18.99 S Shand 1989 9:18.43 9:18.43 9:18.43 15:00/1650 free 1500/1650 free K Burton 1991 16:50.17 K Burton 1991 17:30.18 17:30.18 A Pope 1988 17:38.78 17:38.78 17:38.78
1500/1650 free K Burton 1991 16:50.17 K Burton 1991 17:30.18 17:30.18 A Pope 1988 17:38.78 17:38.78
50 back ID Graner 1989 (26.761D Graner 1989 (30.63 (30.631D Graner 1989 (30.80 (30.80
100 back D Graner 1991 :56.70 D Graner 1989 1:04.66 D Graner 1989 1:07.32 1:06.46
200 back D Graner 1991 2:01.29 D Graner 1989 2:20.66 2:17.86 D Graner 1989 2:19.97 2:19.97
50 breast S Mcintyre-Woods 1991 :30.60 T McFarlane 1991 :34.36 :33.60 R Seaman 1987 :34.36 :32.01
100 breast SMcintyre-Woods 1991 1:06.50 T McFarlane 1991 1:14.82 1:13.60 S Mcintyre-Woods 1991 1:16.60 1:16.05
200 breast B Lambert 1993 2:24.87 G Gatti 1989 2:47.08 2:44.82 N Mitchell 1987 2:50.04 2:42.02
50 fly L Lanini 1987 :25.68 B O'Connor 1988 :29.13 :29.48 R Seaman 1987 :28.79 :28.79
100 fly D Graner 1991 :57.01 D Graner 1989 1:06.31 1:05.71 R Seaman 1987 1:03.91 1:03.91
200 fly J Ford 1987 2:03.38 K Burton 1991 2:28.67 2:17.13 J Ford 1987 2:22.42 2:18.69
100 IM S Shand 1993 :58.84 B O'Connor 1988 1:08.16 1:06.84

WOMEN 30-34		Year	USMS	SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	S Neilson-Bell	1988		A Pettis-Scott	1993	:26.46		S Neilson-Bell	1988	:26.37	:26.37
100 free	S Neilson	1987		S Neilson-Bell	1988	:57.35		S Neilson-Bell	1988	:58.09	:58.09
200 free	S Neilson	1987		S Neilson	1987	2:06.83		B Knight	1989	2:07.84	2:07.84
400/500 free	J Ford	1993	5:05.06	B Knight	1990	4:31.88		B Knight	1991	4:30.38	4:30.38
800/1000 free	B Knight	1990	10:31.89	B Knight	1990	9:17.55	9:09.90	B Knight	1991	9:20.20	9:16.82
1500/1650 free	K Burton	1993	17:07.52	B Knight	1992	18:10.81	17:41.61	K Burton	1992	17:40.50	
50 back	S Walsh-Stankavag	1992	:27.36	L Hasselquist	1989	:32.24	:31.99	B Mauer	1988	:32.11	:32.11
100 back	Z Herrmann	1993	:59.47	L Doughty	1991	1:10.41	1:09.59	Z Herrmann	1992	1:09.07	1:09.07
200 back	Z Herrmann	1993	2:06.26	Z Herrmann	1991	2:32.32	2:32.32	Z Herrmann	1992	2:26.99	2:23.47
50 breast	R Seaman	1989	:29.84	V Kerr-Hauge	1991	:35.25	:33.74	L Bennett	1988	:35.90	:34,56
100 breast	R Seaman	1989	1:05.05	L Bennett	1989	1:18.13	1:15.39	B Scheimann	1993	1:18.80	1:14.52
200 breast	K Melick	1990	2:29.75	K Melick	1991	2:50.96	2:49.16	K Melick	1987	2:53.08	2:48.41
50 fly	R Seaman	1989	:25.62	S Neilson-Bell	1988	:30.20	:29.63	B Harrell	1992	:29.22	:29.22
100 flv	R Seaman	1989	:55.68	T Bennett	1988	1:07.34	1:04.69	B Harrell	1992	1:06.08	1:06.08
200 fly	J Ford	1993	2:07.94	N Mitchell	1991	2:26.98	2:26.35	K Burton	1992	2:27.54	2:27.54
	R Seaman	1989	:58.78	S Neilson-Bell	1988	1:07.78	1:07.78				
	S Neilson	1987	2:09.99	S Neilson	1987	2:27.11	2:27.11	J Lallier	1993	2:28.63	2:29.22
	K Burton	1993		B Rhodes	1991	5:13.84	5:13.69	K Burton	1992	5:11.39	5:11.39
				•				•			
WOMEN 35-39	SC-Yards	Year	USMS	SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
	SC-Yards S Neilson-Bell	Year 1993		SC-Meters S Nielson-Bell	Year 1993	:26.24	:26.24	S Neilson-Bell	Year 1993		:26.89
50 free			:24.21				:26.24			:26.89	:26.89 1:00.25
50 free 100 free	S Neilson-Bell	1993	:24.21	S Nielson-Bell S Nielson-Bell	1993	:26.24	:26.24 1:00.29	S Neilson-Bell	1993	:26.89	:26.89 1:00.25 2:09.33
50 free 100 free 200 free	S Neilson-Bell S Halfacre	1993 1988	:24.21 :52.24 1:52.79	S Nielson-Bell S Nielson-Bell	1993 1992	:26.24 1:00.29	:26.24 1:00.29 2:12.69	S Neilson-Bell S Halfacre	1993 1988	:26.89 1:00.25	:26.89 1:00.25
50 free 100 free 200 free 400/500 free	S Neilson-Bell S Halfacre S Halfacre	1993 1988 1988	:24.21 :52.24 1:52.79	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja	1993 1992 1989	:26.24 1:00.29 2:12.69	:26.24 1:00.29 2:12.69 4:46.93	S Neilson-Bell S Halfacre S Halfacre	1993 1988 1988	:26.89 1:00.25 2:09.33	:26.89 1:00.25 2:09.33
50 free 100 free 200 free 400/500 free 800/1000 free	S Neilson-Bell S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988	:24.21 :52.24 1:52.79 5:01.04 10:39.87	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val	1993 1992 1989 1993	:26.24 1:00.29 2:12.69 4:46.93 9:46.95	:26.24 1:00.29 2:12.69 4:46.93 9:46.95	S Neilson-Bell S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988	:26.89 1:00.25 2:09.33 4:33.08 9:24.54	:26.89 1:00.25 2:09.33 4:33.08 9:24.54
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	S Neilson-Beil S Halfacre S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988 1988	:24.21 :52.24 1:52.79 5:01.04 10:39.87	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val	1993 1992 1989 1993 1987	:26.24 1:00.29 2:12.69 4:46.93 9:46.95	:26.24 1:00.29 2:12.69 4:46.93 9:46.95	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988 1988	:26.89 1:00.25 2:09.33 4:33.08 9:24.54	:26.89 1:00.25 2:09.33 4:33.08 9:24.54
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988 1988 1988	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val	1993 1992 1989 1993 1987 1987	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val	1993 1988 1988 1988 1988 1987	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	S Neilson-Bell S Halfacre L Val	1993 1988 1988 1988 1988 1988 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val	1993 1992 1989 1993 1987 1987 1991	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val	1993 1988 1988 1988 1988 1987 1990	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val	1993 1988 1988 1988 1988 1988 1991 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val L Val	1993 1992 1989 1993 1987 1987 1991	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:12.14	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val	1993 1988 1988 1988 1988 1987 1990 1989	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Osborne	1993 1988 1988 1988 1988 1988 1991 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val K Farnsworth	1993 1992 1989 1993 1987 1987 1991 1991	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:12.14 2:35.03	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.63	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth	1993 1988 1988 1988 1988 1987 1990 1989	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val L Var L Varonsworth L Osborne L Osborne	1993 1988 1988 1988 1988 1991 1991 1992 1989 1989	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val K Farnsworth L Osborne L Osborne	1993 1992 1989 1993 1987 1987 1991 1991 1991 1989	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:12.14 2:35.03 :34.63	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.63 1:16.70	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Wetzel-Osborne	1993 1988 1988 1988 1987 1990 1989 1992 1989	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Osborne	1993 1988 1988 1988 1988 1988 1991 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val L Val K Farnsworth L Osborne L Osborne L Osborne	1993 1992 1989 1993 1987 1987 1991 1991 1991	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:12.14 2:35.03 :34.63 1:16.70	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.63 1:16.70 2:50.93	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Wetzel-Osborne L Wetzel-Osborne	1993 1988 1988 1988 1988 1987 1990 1989 1992 1989	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41 1:17.44	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fiy	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Osborne L Osborne K Melick L Val	1993 1988 1988 1988 1988 1991 1991 1992 1989 1992 1987	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58 2:30.53 :26.68	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val K Farnsworth L Osborne L Osborne L Osborne L Osborne	1993 1992 1989 1993 1987 1987 1991 1991 1991 1989 1989	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:12.14 2:35.03 :34.63 1:16.70 2:50.93	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.63 1:16.70 2:50.93 :30.05	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Wetzel-Osborne K Melick	1993 1988 1988 1988 1987 1997 1999 1999 1990 1992	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 1:17.44 2:53.64	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 1:17.44 2:51.75
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fy 100 fly	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val L Osborne L Osborne K Melick L Val S Halfacre	1993 1988 1988 1988 1988 1991 1991 1992 1989 1989	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58 2:30.53 :26.68 :56.90	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val K Farnsworth L Osborne	1993 1992 1989 1993 1987 1987 1991 1991 1991 1989 1989	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:12.14 2:35.03 :34.63 1:16.70 2:50.93 :30.05	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.63 1:16.70 2:50.93 :30.05	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val K Farnsworth L Wetzel-Osborne L Wetzel-Osborne K Melick S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988 1987 1990 1989 1992 1989 1992 1988	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 1:17.44 2:53.64 :29.27	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41 1:17.44 2:51.75 :29.27
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val L Osborne L Osborne K Melick L Val S Halfacre	1993 1988 1988 1988 1988 1988 1991 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58 2:30.63 :26.68 :56.90 2:10.80	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val L Val L Val L Osborne L Osborne L Osborne L Osborne L Val M Velikonja L Val	1993 1992 1989 1993 1987 1987 1991 1991 1989 1989 1989 1989	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 1:8:27.71 :32.50 1:12.14 2:35.03 :34.63 1:16.70 2:50.93 :30.05 1:07.28 2:28.96	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.63 1:16.70 2:50.93 :30.05 1:07.28 2:28.96	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val L Wetzel-Osborne L Wetzel-Osborne K Melick S Halfacre S Halfacre	1993 1988 1988 1988 1987 1990 1989 1992 1989 1992 1988 1988	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41 1:17.44 2:53.64 :29.27	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41 1:17.44 2:51.75 :29.27
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val K Farnsworth L Osborne L Osborne K Melick L Val S Halfacre L Val S Halfacre	1993 1988 1988 1988 1988 1988 1991 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58 2:30.53 :26.68 :56.90 1:00.22	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val L Val L Val C Sborne L Osborne L Osborne L Osborne L Val M Velikonja L Val S Nielson-Bell	1993 1992 1989 1993 1987 1987 1991 1991 1989 1989 1989 1991 1993	:26.24 1:00.29 2:12.69 4:46.95 18:27.71 :32.50 1:12.14 2:35.03 34.63 1:16.70 2:50.93 :30.05 1:07.28 2:28.96 1:08.15	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 34.63 1:16.70 2:50.93 :30.05 1:07.28 2:28.96 1:08.15	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre C Halfacre L Val L Val K Farnsworth L Wetzel-Osborne L Wetzel-Osborne K Melick S Halfacre S Halfacre S Halfacre	1993 1988 1988 1988 1987 1990 1989 1992 1989 1992 1988 1988	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 13:4.41 1:17.44 2:53.64 :29.27 1:05.39 2:26.38	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 :34.41 1:17.44 2:51.75 :29.27
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly 100 lM 200 IM	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val L Osborne L Osborne K Melick L Val S Halfacre	1993 1988 1988 1988 1988 1988 1991 1991	:24.21 :52.24 1:52.79 5:01.04 10:39.87 17:15.23 :27.82 1:01.68 2:15.44 :30.85 1:07.58 2:30.53 :26.68 :56.90 2:10.80	S Nielson-Bell S Nielson-Bell J Hirsty M Velikonja L Val L Val L Val L Val L Val L Osborne L Osborne L Osborne L Osborne L Val M Velikonja L Val	1993 1992 1989 1993 1987 1987 1991 1991 1989 1989 1989 1989	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 1:8:27.71 :32.50 1:12.14 2:35.03 :34.63 1:16.70 2:50.93 :30.05 1:07.28 2:28.96	:26.24 1:00.29 2:12.69 4:46.93 9:46.95 18:27.71 :32.50 1:10.47 2:34.09 :34.69 1:16.70 2:50.93 :30.05 1:07.28 2:28.96 1:08.15 2:31.39	S Neilson-Bell S Halfacre S Halfacre S Halfacre S Halfacre S Halfacre L Val L Val L Val L Wetzel-Osborne L Wetzel-Osborne K Melick S Halfacre S Halfacre	1993 1988 1988 1988 1988 1987 1990 1989 1992 1989 1992 1988 1988 1989	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.35 1:10.94 2:35.44 :34.41 1:17.44 2:53.64 :29.27 1:05.39 2:26.38 2:36.67	:26.89 1:00.25 2:09.33 4:33.08 9:24.54 18:12.11 :32.39 1:10.94 2:35.44 1:17.44 2:51.75 :29.27 1:05.39 2:26.38

WOMEN 40 44	SC Yards	Year	USMS	SC Meters	Year	USMS	World LC Meters	Year	USMS	World
50 free	L Val	1992	24 95	L Val	1992	28 25	28 25 L Val	1992	28 05	28 05
100 free	L Val	1992	54 48	L Val	1992	1 01 15	1 01 15 L Val	1993	1 02 24	1 02 99
200 free	B Dunbar	1990	2 04 00	L Val	1992	2 14 32	2 14 32 L Val	1993	2 17 01	2 17 01
400/500 free	B Dunbar	1989	5 30 58	B Dunbar	1992	4 50 68	4 50 68 B Dunbar	1990	4 54 49	4 54 49
800/1000 free	B Dunbar	1990	11 20 18	B Dunbar	1991	10 04 16	10 04 16 L Val	1993	9 57 69	9 57 69
1500/1650 free	B Dunbar	1989	18 58 23	B Dunbar	1990	19 00 81	19 00 81 B Dunbar	1992	19.00 40	19 00 40
50 back	L Val	1992	27 91	B Adaır	1992	34 63	·33 85 L Val	1992	32 42	32 42
100 back	L Val	1992	1 02.22	L Val	1992	1 10 94	1 10 94 L Val	1992	1 11 03	1 11 03
200 back	J Pesavento	1992	2 23 47		1992	2 38 40	2 [.] 38 40 L Val	1993	2 44 00	2 43 23
50 breast	D Walker	1993	32 84	G Benty	1992	37 79	37 64 A Wright Belknap	1992	37 02	37 02
100 breast	D Munger	1992	1 11 73	G Benty	1992	1 22 19	1.22 19 D Walker	1991	1 21 73	1 21 73
200 breast	G Benty	1993	2 37 37	G Benty	1992	2 54 12	2 54 12 G Benty	1993	2 59 24	2 59 24
50 fly	L Val	1993	26 92	L Val	1992	30 18	30 18 L Val	1992	30 13	30 13
100 fly	L Val	1992	59 22	L Val	1992	1 07 59	1.07 59 L Val	1992	1 06 27	1 06 27
200 fly	L Val	1992	2 11 08	B Dunbar	1989	2 32 19	2:32 19 B Dunbar	1989	2 33 51	2 33 51
100 IM	B Adair	1993	1 03 82	L Val	1992	1 11 65	1 11 65			
200 IM	B Adair	1993	2 20 57	L Val	1992	2 33 89	2:33 89 L Val	1993	2 38 20	2 38 20
400 IM	C Kohn	1993	5 02 59	L Val	1992	5 32 53	5:32 53 L Val	1993	5 39 70	5 39 70
	•						•			
WOMEN 45 49	SC Yards	Year	USMS	SC Meters	Year	USMS	World LC Meters	Year	USMS	World
WOMEN 45 49 50 free	SC Yards A Mueller	Year 1988	25 98	N Ridout	Year 1989	30 05	29 73 A Mueller	1987	29 08	29 08
			25 98				29 73 A Mueller 1 05 20 A Mueller		29 08 1 05 44	29 08 1 05 44
50 free	A Mueller	1988	25 98 57 91	N Ridout	1989	30 05	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller	1987 1987 1987	29 08 1 05 44 2 24 24	29 08 1 05 44 2 24 24
50 free 100 free	A Mueller A Mueller	1988 1987	25 98 57 91 2 05 71	N Ridout S Wise	1989 1992	30 05 1 06 64	29 73 A Mueller 1 05 20 A Mueller	1987 1987	29 08 1 05 44	29 08 1 05 44
50 free 100 free 200 free	A Mueller A Mueller A Mueller	1988 1987 1988 1988	25 98 57 91 2 05 71	N Ridout S Wise A Mueller A Mueller	1989 1992 1987 1990	30 05 1 06 64 2 28 69 5 08 62	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller	1987 1987 1987 1987	29 08 1 05 44 2 24 24	29 08 1 05 44 2 24 24 5 08 67
50 free 100 free 200 free 400/500 free	A Mueller A Mueller A Mueller A Mueller	1988 1987 1988 1988 1991	25 98 57 91 2 05 71 5 40 37 11 54 44	N Ridout S Wise A Mueller A Mueller	1989 1992 1987 1990 1991	30 05 1 06 64 2 28 69 5 08 62 11 04 43	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller	1987 1987 1987 1987 1987	29 08 1 05 44 2 24 24 5 08 67	29 08 1 05 44 2 24 24 5 08 67 10 48 41
50 free 100 free 200 free 400/500 free 800/1000 free	A Mueller A Mueller A Mueller A Mueller A Mueller	1988 1987 1988 1988 1991	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73	N Ridout S Wise A Mueller A Mueller J Katz	1989 1992 1987 1990 1991	30 05 1 06 64 2 28 69 5 08 62 11 04 43	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller	1987 1987 1987 1987 1987	29 08 1 05 44 2 24 24 5 08 67 10 48 41	29 08 1 05 44 2 24 24 5 08 67 10 48 41
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller	1988 1987 1988 1988 1991 1986	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57	N Ridout S Wise A Mueller A Mueller J Katz A Svanson	1989 1992 1987 1990 1991	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller	1987 1987 1987 1987 1987 1987	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett	1988 1987 1988 1988 1991 1986 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett	1989 1992 1987 1990 1991 1991 1989	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank	1987 1987 1987 1987 1987 1987 1992	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett	1988 1987 1988 1988 1991 1986 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell	1989 1992 1987 1990 1991 1991 1989 1992	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan	1987 1987 1987 1987 1987 1987 1992 1982	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester	1988 1987 1988 1988 1991 1986 1988 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett	1989 1992 1987 1990 1991 1991 1989 1992 1989	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller	1987 1987 1987 1987 1987 1987 1992 1982	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Mueller B Bennett C Chidester D Todd	1988 1987 1988 1988 1991 1986 1988 1988 1991	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46 1 14 11	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich	1989 1992 1987 1990 1991 1991 1989 1992 1989 1990	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 38 67	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak	1987 1987 1987 1987 1987 1987 1992 1982 1986 1992	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 39 20	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 37 77
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester D Todd G Pierson	1988 1987 1988 1988 1991 1986 1988 1991 1989	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46 1 14 11 2 44 46	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich C Boak G Pierson	1989 1992 1987 1990 1991 1991 1989 1992 1989 1990	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 38 67 1 23 49	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak 1 23 49 C Boak	1987 1987 1987 1987 1987 1987 1982 1982 1986 1992	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 39 20 1 26 28	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 37 77 1 26 28
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester D Todd G Pierson C Boak	1988 1987 1988 1988 1991 1986 1988 1991 1989 1991	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46 1 14 11 2 44 46 28 26	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich C Boak	1989 1992 1987 1990 1991 1991 1989 1992 1989 1990 1992	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 38 67 1 23 49 3 04 75	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak 1 23 49 C Boak 3 04 75 C Boak	1987 1987 1987 1987 1987 1987 1992 1982 1986 1992 1992	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 39 20 1 26 28 3 09 19	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 37 77 1 26 28 3 09 19
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester D Todd G Pierson C Boak A Mueller A Mueller	1988 1987 1988 1988 1991 1986 1988 1991 1989 1991 1993 1988 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46 1 14 11 2 44 46 28 26 1 03 08	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich C Boak G Pierson S Wise D Todd	1989 1992 1987 1990 1991 1991 1989 1992 1989 1990 1992 1991	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 38 67 1 23 49 3 04 75 33 17	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak 1 23 49 C Boak 3 04 75 C Boak 3 2 97 A Mueller	1987 1987 1987 1987 1987 1987 1992 1986 1992 1992 1992	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 39 20 1 26 28 3 09 19 30 74	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 37 77 1 26 28 3 09 19 30 74
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester D Todd G Pierson C Boak A Mueller A Mueller A Mueller A Mueller	1988 1987 1988 1988 1991 1986 1988 1991 1989 1991 1993 1998 1988 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46 1 14 11 2 44 46 28 26 1 03 08 2 20 14	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich C Boak G Pierson S Wise D Todd A Mueller	1989 1992 1987 1990 1991 1991 1989 1992 1990 1992 1991 1992 1992 1992	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 38 67 1 23 49 3 04 75 3 04 75 1 17 96 2 37 88	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak 1 23 49 C Boak 3 04 75 C Boak 3 2 97 A Mueller 1 14 85 A Mueller 2 37 88 A Mueller	1987 1987 1987 1987 1987 1987 1992 1982 1986 1992 1992 1992 1987	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 39 20 1 26 28 3 09 19 30 74 1 12.67	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 37 77 1 26 28 3 09 19 30 74 1 12 67
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 200 breast 200 free 50 fly 100 fly 200 fly 100 IM	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester D Todd G Pierson C Boak A Mueller A Mueller A Mueller A Mueller A Mueller D Todd	1988 1987 1988 1988 1991 1986 1988 1991 1993 1991 1993 1998 1988 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 1 14 11 2 44 46 1 03 08 2 20 14 1 07 38	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich C Boak G Pierson S Wise D Todd A Mueller	1989 1992 1987 1990 1991 1991 1989 1992 1989 1990 1992 1991 1992 1997 1997	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 7 1 23 49 3 04 75 33 17 1 17 98 2 37 98 1 14 41	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak 1 23 49 C Boak 3 04 75 C Boak 32 97 A Mueller 1 14 85 A Mueller 1 14 41	1987 1987 1987 1987 1987 1987 1992 1982 1986 1992 1992 1992 1987	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 3 99 20 1 26 28 3 09 19 30 74 1 12.67 2 44 10	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 37 77 1 26 28 3 09 19 30 74 1 12 67
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	A Mueller A Mueller A Mueller A Mueller A Mueller A Mueller B Bennett B Bennett C Chidester D Todd G Pierson C Boak A Mueller A Mueller A Mueller A Mueller	1988 1987 1988 1988 1991 1986 1988 1991 1989 1991 1993 1998 1988 1988	25 98 57 91 2 05 71 5 40 37 11 54 44 20 12 73 32 57 1 11 07 2 30 46 34 46 1 14 11 2 44 46 28 26 1 03 08 2 20 14 1 07 38 2 24 53	N Ridout S Wise A Mueller A Mueller J Katz A Svanson B Bennett J Mitchell B Bennett E Bromwich C Boak G Pierson S Wise D Todd A Mueller	1989 1992 1987 1990 1991 1991 1989 1992 1990 1992 1991 1992 1992 1992	30 05 1 06 64 2 28 69 5 08 62 11 04 43 22 06 73 37 29 1 20 40 2 56 06 38 67 1 23 49 3 04 75 3 04 75 1 17 96 2 37 88	29 73 A Mueller 1 05 20 A Mueller 2 28 69 A Mueller 5 16 35 A Mueller 10 51 84 A Mueller 21 20 47 A Mueller 35 43 M Frank 1 17 13 B Jordan 2 48 85 A Mueller 38 67 C Boak 1 23 49 C Boak 3 04 75 C Boak 3 2 97 A Mueller 1 14 85 A Mueller 2 37 88 A Mueller	1987 1987 1987 1987 1987 1987 1992 1982 1992 1992 1992 1997 1987	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 37 43 1 21 04 2 56 28 39 20 1 26 28 3 09 19 30 74 1 12.67	29 08 1 05 44 2 24 24 5 08 67 10 48 41 21 08 30 34 51 1 17 06 2 50 27 7 1 26 28 3 09 19 30 74 1 12 67 2 44 10

WOMEN 50 54	SC Yards	Year	USMS S	C Meters	Year	USMS	World	LC Meters	Year	USMS	World
50 free	N Ridout	1992	27 29 N	Ridout	1992	30 48	30 48	A Mueller	1993	29 33	29 33
100 free	A Mueller	1993	59 05 A	Mueller	1991	1 06 41	1.06 41	A Mueller	1992	1 07 42	1 07 42
200 free	A Mueller	1992	2 12.11 A	Mueller	1991	2 28 85	2 27 95	A Mueller	1993	2 29 22	2 29 22
400/500 free	A Mueller	1992	5 53 05 A	Mueller	1991	5 12 43	5 12 43	A Mueller	1991	5 16 62	5 16 62
800/1000 free	A Mueller	1992	12:04 75 N	Ridout	1992	11 20 21	11 20 21	A Mueller	1991	10 58 47	10 58 47
1500/1650 free	A Mueller	1992	20 08 79 L	Stoinoff	1987	21 44 35	21 44 35	A Mueller	1991	21 02 46	21 02 46
50 back	B Jordan	1990	32 72 B	Jordan	1991	37 59		B Jordan	1991	37 62	34 87
100 back	B Jordan	1990	1 11 96 A	Mueller	1991	1 20 50	1 19 17	B Jordan	1991	1 23 29	1 19 45
200 back	B Jordan	1991	2 38 09 A	Mueller	1991	2 48 88	2 48 88	B Jordan	1987	3 01 07	2 51 11
50 breast	J Bruner	1985	35 55 J I	Leilich	1990	40 51	38 82	J Bruner	1986	40 22	39 52
100 breast	J Leilich	1989	1 17 72 J I		1989	1 28 51	1 25 73	J Leilich	1990	1 28 83	1 28 83
200 breast	J Leilich	1990	2 50 93 J I	Leilich	1989	3 11 20	3 08 87	E Bromwich	1993	3 15 51	3 13 64
50 fly	A Mueller	1993		Brougher	1992	34 37		A Mueller	1993	31 69	31 69
100 fly	A Mueller	1992	1 05 69 A	Mueller	1991	1 12 66	1 12 66	A Mueller	1993	1 13 86	1 13 86
200 fly	A Mueller	1992	2 25 73 S	Rademaker	1989	3 11 83	3 11 83	A Mueller	1991	2 49 53	2 49 53
100 IM	A Mueller	1993	1 09 66 A		1991	1 18 05	1 18 05				
200 IM	A Mueller	1992	2 32 89 N		1992	3 04 26		A Mueller	1991	2 54 57	
400 IM	A Mueller	1992	5 22.42 A	Mueller	1991	5 56 24	5 56 24	A Mueller	1992	6 12.08	6 12 08
								•			
WOMEN 55-59		Year	USMS		Year	USMS		LC Meters	Year	USMS	World
50 free	J Bruner	1990	28 03 J I		1989	31 83		J Bruner	1991	32.59	32.59
100 free	J Bruner	1990	1 02.38 J I		1989	1 11 63		J Bruner	1989	1 12.34	1 11 01
200 free	L Stornoff	1988	2 22.66 L		1989	2 40 27		L Stoinoff	1988	2 42.04	2 36 58
400/500 free	L Stoinoff	1988	6 09 83 L		1989	5 34 32		L Stoinoff	1988	5 36 66	
800/1000 free	L Stornoff		12 45 02 L					L Stoinoff	1988	11:30 97	
1500/1650 free	L Stoinoff		21 22 63 L					L Stoinoff		22 18 91	
50 back	B Jordan	1993	32 97 B		1992	37 92		B Jordan	1992	37 30	37 30
100 back	B Jordan	1992	1 11 11 B		1992	1 21 90		B Jordan	1992	1 21 42	1 21 42
200 back	B Jordan	1992	2 34 80 B		1992	3 00 66		B Jordan	1992	2 59 18	2 59 18
50 breast	J Bruner	1991	35 16 J I		1991	40 69		J Bruner	1991	39 91	39 91
100 breast	J Bruner	1991	1 18 52 J I		1991	1 30 31		J Bruner	1992	1 29 88	1 29 88
200 breast	J Bruner	1991	3 00 46 J I		1991	3 23 08		J Bruner	1991	3 27 89	3 18 11
50 fly	G Roper	1985	31 76 B		1992	37 50		G Roper	1985	35 29	35 29
100 fly	J Bruner	1991	1 15 18 B		1992	1 27 95		G Roper	1985	1 27 49	1 27 49
200 fly	G Roper	1986	2 51 18 G		1986	3 20 43		G Roper	1985	3 19 84	3 17 68
100 IM	J Bruner	1992	1 12.56 J I		1989	1 24 19	1 22 29				
200 IM	B Jordan	1992	2 44 30 B		1992	3 05 53		J Bruner	1992	3 06 11	3 06 11
400 IM	N Brown	1991	5 54 24 B	Jordan	1992	6 39 90	6.36 03	G Roper	1985	6 42.05	6 42.05

WOMEN 60-64	SC-Yards	Year	USMS		Year	USMS		LC-Meters	Year	USMS	World
50 free	D Donnelly	1982	:30.67 A		1989	:35.33		D Donnelly	1985	:35.08	:33.60
100 free	L Stoinoff	1993	1:08.08 L		1993	1:16.63		L Stoinoff	1993	1:16.97	1:14.25
200 free	L Stoinoff	1993	2:26.09 L		1993	2:39.93		L Stoinoff	1993	2:43.83	2:43.83
400/500 free	L Stoinoff	1993	6:22.62 L		1993	5:38.06		L Stoinoff	1993	5:47.52	5:47.52
800/1000 free	L Stoinoff	1993			1993			L Stoinoff		12:04.16	
1500/1650 free	L Stoinoff	1993	22:13.13 C		1990	23:28.15		L Stoinoff		23:17.39	
50 back	C Walker	1991	:35.27 C	Walker	1989	:39.60	:39.60	D Steadman	1989	:40.35	:40.35
100 back	C Walker	1991	1:17.94 C	Walker	1989	1:29.13	1:29.13	C Walker	1986	1:31.06	1:30.22
200 back	L Stoinoff	1993	2:54.33 D	Steadman	1988	3:16.14		L Stoinoff	1993	3:14.11	3:14.11
50 breast	C Taylor	1990	:39.74 C	Taylor	1989	:45.39	:42.02	A Pisciotta	1992	:45.75	:42.49
100 breast	A Pisciotta	1991	1·27.13 A	Pisciotta	1992	1:37.78	1:34.05	A Pisciotta	1992	1:40.18	1:35.86
200 breast	A Pisciotta	1991	3:11.24 A	Pisciotta	1991	3:36.01		A Pisciotta	1992	3:35.36	3:27.50
50 fly	B Brey	1992	:34.94 A		1989	:39.64	:38.40	A Adams	1988	:38.64	:38.54
100 fly	J Eppley	1980	1:23.43 P	Dotson	1987	1:36.95		A Adams	1988	1:34.48	1:31.52
200 fly	J Krauser	1988	3:10.64 J	Krauser	1990	3:32.29	3:21.73	G Roper	1990	3:32.87	3:28.58
100 IM	C Walker	1989	1:18.93 C	Walker	1989	1:27.50	1:27.50				
200 IM	C Walker	1991	2:52.50 C	Walker	1990	3:14.28	3:14.28	C Walker	1986	3:17.40	3:15.30
400 IM	C Walker	1991	6:14.72 C	Walker	1991	6:58.97	6:50.55	C Walker	1986	6:59.45	6:59.08
WOMEN 65-69		Year	USMS S		Year	USMS		LC-Meters	Year	USMS	World
50 free	C Walker	1992	:31.01 C	Walker	1991	:35.76	:34.38	C Walker	1992	:34.75	:34.75
50 free 100 free	C Walker C Walker	1992 1992	:31.01 C 1:09.04 C	Walker Walker	1991 1991	:35.76 1:20.80	:34.38 1:20.80	C Walker C Walker	1992 1992	:34.75 1:16.84	:34.75 1:16.84
50 free 100 free 200 free	C Walker C Walker C Walker	1992 1992 1992	:31.01 C 1:09.04 C 2:35.44 P	Walker Walker Smith	1991 1991 1991	:35.76 1:20.80 3:03.63	:34.38 1:20.80 3:02.54	C Walker C Walker C Walker	1992 1992 1992	:34.75 1:16.84 2:48.51	:34.75 1:16.84 2:48.51
50 free 100 free 200 free 400/500 free	C Walker C Walker C Walker C Walker	1992 1992 1992 1992	:31.01 C 1:09.04 C 2:35.44 P 6:49.80 C	Walker Walker Smith Walker	1991 1991 1991 1992	:35.76 1:20.80 3:03.63 6:13.42	:34.38 1:20.80 3:02.54 6:13.42	C Walker C Walker C Walker C Walker	1992 1992 1992 1991	:34.75 1:16.84 2:48.51 6:05.22	:34.75 1:16.84 2:48.51 6:05.22
50 free 100 free 200 free 400/500 free 800/1000 free	C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1992 1993	:31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C	Walker Walker Smith Walker Walker	1991 1991 1991 1992 1992	:35.76 1:20.80 3:03.63 6:13.42 12:35.26	:34.38 1:20.80 3:02.54 6:13.42 12:35.26	C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1991 1992	:34.75 1:16.84 2:48.51 6:05.22 12:27.60	:34.75 1:16.84 2:48.51 6:05.22 12:27.60
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	C Walker C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1992 1993 1993	:31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C	Walker Walker Smith Walker Walker Walker Walker	1991 1991 1991 1992 1992	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44	C Walker C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1991 1992 1992	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	C Walker C Walker C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1992 1993 1993 1992	:31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D	Walker Walker Smith Walker Walker Walker Walker Swalker	1991 1991 1991 1992 1992 1992 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48	C Walker C Walker C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1991 1992 1992	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1992 1993 1993 1992 1993	:31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D	Walker Walker Smith Walker Walker Walker Walker Walker Steadman	1991 1991 1991 1992 1992 1992 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker	1992 1992 1992 1991 1992 1992 1992 1991	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	C Walker	1992 1992 1992 1992 1993 1993 1992 1993 1992	:31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D	Walker Walker Smith Walker Walker Walker Walker Steadman Steadman	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman	1992 1992 1992 1991 1992 1992 1992 1991 1990	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	C Walker	1992 1992 1992 1992 1993 1993 1992 1993 1992	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D :40.79 B	Walker Walker Smith Walker Walker Walker Steadman Steadman	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back	C Walker	1992 1992 1992 1992 1993 1993 1992 1993 1992 1993	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D :40.79 B 1:29.00 R	Walker Walker Smith Walker Walker Walker Walker Steadman Steadman Christian	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:46.82	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57	C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker	1992 1992 1992 1991 1992 1992 1992 1993 1991	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	C Walker	1992 1992 1992 1992 1993 1993 1992 1993 1992	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D :40.79 B	Walker Walker Smith Walker Walker Walker Walker Steadman Steadman Christian	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:46.82 3:48.71	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57 3:46.02	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993 1991	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84 3:49.13	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84 3:45.71
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast	C Walker	1992 1992 1992 1992 1993 1993 1992 1993 1992 1993	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D :40.79 B 1:29.00 R	Walker Walker Smith Walker Walker Walker Walker Walker Steadman Steadman Steadman Christian Kenner	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:46.82	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57 3:46.02 :44.27	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker C Walker	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993 1991 1992 1999	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84 3:49.13 :43.35	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84 3:45.71 :43.35
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	C Walker	1992 1992 1992 1992 1993 1993 1992 1993 1992 1993 1993	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D :40.79 B 1:29.00 R 3:15.96 R 3:38.39 F 1:28.14 J	Walker Walker Smith Walker Walker Walker Walker Steadman Steadman Christian Kenner Kenuser	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:46.82 3:48.71 :43.93 1:38.74	:34.38 1:20.80 3.02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57 3:46.02 :44.27 1:38.74	C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker C Walker J Krauser	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993 1991 1990 1990	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84 3:49.13 :43.35 1:40.35	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84 3:45.71 :43.35 1:40.35
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fy	C Walker	1992 1992 1992 1992 1993 1993 1993 1993	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D :58.87 D 1:29.00 R 3:15.96 R :38.39 F 1:28.14 J 3:13.72 J	Walker Walker Smith Walker Walker Walker Walker Steadman Steadman Christian Kenner Krauser Krauser	1991 1991 1991 1992 1992 1992 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 40.48 1:30.41 3:15.72 :47.39 1:46.82 3:48.71 3:48.71 3:36.03	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57 3:46.02 :44.27 1:38.74 3:36.36	C Walker C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker C Walker	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993 1991 1992 1999	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84 3:49.13 :43.35	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84 3:45.71 :43.35
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly	C Walker J Eppley J Krauser	1992 1992 1992 1992 1993 1993 1993 1993	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D 2:58.87 D :40.79 B 1:29.00 R 3:15.96 R 3:38.39 F 1:28.14 J	Walker Walker Smith Walker Walker Walker Walker Steadman Steadman Christian Kenner Krauser Krauser	1991 1991 1991 1992 1992 1989 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:46.82 3:48.71 :43.93 1:38.74	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57 3:46.02 :44.27 1:38.74 1:35.76	C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker C Walker F Carr J Krauser	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993 1991 1990 1990	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84 3:49.13 :43.35 1:40.35	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84 3:45.71 :43.35 1:40.35
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	C Walker J Eppley J Krauser	1992 1992 1992 1993 1993 1993 1993 1993	31.01 C 1:09.04 C 2:35.44 P 6:49.80 C 14:04.18 C 23:46.31 C :36.03 D 1:21.48 D :58.87 D 1:29.00 R 3:15.96 R :38.39 F 1:28.14 J 3:13.72 J	Walker Walker Smith Walker Walker Walker Steadman Steadman Christian Kenner Kenner Krauser Krauser Carr	1991 1991 1992 1992 1992 1989 1989 1989	:35.76 1:20.80 3:03.63 6:13.42 12:35.26 23:38.44 40.48 1:30.41 3:15.72 :47.39 1:46.82 3:48.71 3:48.71 3:36.03	:34.38 1:20.80 3:02.54 6:13.42 12:35.26 23:38.44 :40.48 1:30.41 3:15.72 :47.39 1:43.57 3:46.02 :44.27 1:38.74 1:35.76	C Walker C Walker C Walker C Walker C Walker C Walker C Walker D Steadman C Walker C Walker C Walker J Krauser	1992 1992 1992 1991 1992 1992 1992 1991 1990 1993 1991 1990 1990	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:30.97 3:17.12 :46.07 1:42.84 3:49.13 :43.35 1:40.35	:34.75 1:16.84 2:48.51 6:05.22 12:27.60 24:07.05 :39.85 1:31.58 3:17.12 :45.61 1:42.84 3:45.71 :43.35 1:40.35

WOMEN 70-74	SC-Yards	Year	USMS SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
50 free	D Donnelly	1993	:33.79 D Donnelly	1992	:39.13	:38.95	D Donnelly	1993	:38.12	:37.61
100 free	D Donnelly	1992	1:15.98 M Meyer	1992	1:29.76	1:29.76	D Donnelly	1993	1:28.54	1:28.07
200 free	M Meyer	1993	2:51.42 M Meyer	1992	3:18.51	3:18.51	M Meyer	1993	3:24.07	3:21.01
400/500 free	M Meyer	1993	7:51.53 M Meyer	1992	6:54.54	6:54.54	M Meyer	1993	7:07.58	7:07.58
800/1000 free	M Meyer	1993	16:23.35 M Meyer	1992	14:29.66	14:29.66	M Meyer	1993	15:00.12	15:00.12
1500/1650 free	M Meyer	1993	27:15.78 R Simonton	1990	28:29.85	28:29.85	M Meyer	1993	28:39.46	28:39.46
50 back	M Meyer	1993	:40.87 M Meyer	1992	:47.22	:45.08	B Cederlund	1992	:44.53	:44.53
100 back	J Merryman	1993	1:33.65 Y Frischhertz	1990	1:51.64	1:44.02	B Cedarlund	1992	1:44.88	1:39.85
200 back	M Meyer	1993	3:19.98 Y Frischhertz	1987	3:56.72	3:53.86	B Cedarlund	1992	3:52.95	3:47.59
50 breast	B Christian	1993	:43.90 G Zint	1987	:50.95	:50.53	B Christian	1992	:50.08	:49.57
100 breast	B Christian	1992	1:39.18 G Zint	1987	1:55.84	1:54.84	B Christian	1992	1:52.88	1:52.88
200 breast	B Christian	1992	3:36.00 G Zint	1987	4:11.18	4:09.41	B Christian	1992	4:06.80	4:06.80
50 fly	J Eppley	1990	:40.34 G Zint	1989	:51.96	:48.27	J Eppley	1990	:49.55	:46.55
100 fly	J Eppley	1990	1:39.75 G Zint	1988	2:04.25	2:04.25	J Eppley	1992	2:06.32	2:02.61
200 fly	J Eppley	1990	3:54.84 M Merlino	1986	4:36.96	4:36.96	M Merlino	1982	4:37.05	4:37.05
100 IM	B Christian	1993	1:33.02 G Zint	1988	1:50.32	1:43.67				
200 IM	D Donnelly	1992	3:31.04 D Donnelly	1992	4:01.01	4:01.01	D Donnelly	1993	4:03.39	3:51.91
400 IM	M Merlino	1982	7:36.45 R Simonton	1988	8:34.79	8:34.79	R Simonton	1988	8:39.36	8:33.57
WOMEN 75-79		Year	USMS SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	L Wingard	1987	:36.17 M Merlino	1988	:43.98		L Donovan	1993	:42.29	:40.85
100 free	L Wingard	1986	1:21.57 N Clark	1990	1:46.64		L Donovan	1993	1:38.28	1:38.28
200 free	L. Wingard	1987		1992	3:51.23		R Simonton	1993	3:37.64	3:37.64
400/500 free	L Donovan	1993	8:53.70 M Merlino	1988	8:11.07		R Simonton	1993	7:38.77	7:38.77
800/1000 free	L Donovan	1993	18:18.21 A Etienne				R Simonton	1993	15:42.58	
1500/1650 free	J Durston	1990					R Simonton		29:45.90	
50 back	M Wicklun	1989	:46.51 M Wicklun	1989	:52.11		A Walker	1991	:50.45	:46.64
100 back	A Walker	1992	1:42.30 A Walker	199,1	1:53.00		A Walker	1993	1:53,66	1:49.73
200 back	M Wicklun	1991	3:42.11 M Wicklun	1989	4:01.89		M Wicklun	1989	4:07.44	4:07.44
50 breast	G Zint	1993	:48.53 G Zint	1993	:53.94	:53.94		1993	:55.58	:52.90
100 breast	G Zint	1993	1:49.55 G Zint	1993	2:03.89	2:00.27		1993	2:05.99	2:05.99
200 breast	G Zint	1993	4:07.40 G Zint	1993	4:32.71		M Merlino	1987	4:39.52	4:36.72
50 fly	G Zint	1993	:47.97 G Zint	1993	:56,53	:56.53		1993	:55.38	:55.38
100 fly	G Zint	1993	2:00.42 M Merlino	1988	2:12.17		K Schimpf	1992	2:19.44	2:19.44
200 fly	M Merlino	1988	4:19.43 M Merlino	1988	4:48.50		M Merlino	1988	4:54.79	4:54.79
	IG Zint		4 40 7010 754	1993	1:58.06	1:58.06				
100 IM		1993	1:43.76 G Zint							
100 IM 200 IM 400 IM	M Merlino M Merlino	1993 1988 1988	3:56.09 M Merlino 8:10.40 M Merlino	1988 1988	4:17.89 9:07.66	4:17.89	M Merlino M Merlino	1987 1987	4:25.80 9:11.23	4:20.42 9:11.23

WOMEN 80-84	SC-Yards	Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	J Dolce	1991	5-10-10-10-10-10-10-10-10-10-10-10-10-10-	J Dolce	1989	:48.76	0.0000000000000000000000000000000000000	M Merlino	1992	:48.46	:44.25
100 free	J Dolce	1990	1:39.96		1989	1:54.23	1:53.70	J Dolce	1991	1:55.84	1:39.30
200 free	J Dolce	1990	3:51.76	J Dolce	1989	4:17.73	4:17.73	M Merlino	1992	4:21.21	3:44.00
400/500 free	R Switzer	1988	10:45.81	M Merlino	1992	8:48.24	8:48.24	M Merlino	1992	9:02.79	8:23.50
800/1000 free	D Hopkins	1990	22:36.51	M Merling	1992	18:14.52	18:11.90	M Merlino	1992	18:43.13	17:21.19
1500/1650 free	D Hopkins	1990	38:35.07	M Merlino	1992	35:07.91	35:07.91	J Dolce	1990	36:54.26	33:59.65
50 back	A Soule	1989	:52.35	M Merlino	1992	:59.47	:59.47	A Soule	1989	:55.07	:53.73
100 back	A Soule	1989	1:56.19	M Merlino	1992	2:15.14	2:06.95	A Soule	1989	2:07.79	2:01.87
200 back	A Soule	1991	4:16.57	M Merlino	1992	4:38.53	4:38.53	A Soule	1989	4:38.26	4:22.89
50 breast	H Meise	1993	:59.02	M Merlino	1992	1:05.64	1:05.64	M Merlino	1992	1:05.10	:59.60
100 breast	H Meise	1993	2:17.42	M Merlino	1992	2:21.80	2:21.80	M Merlino	1992	2:22.79	2:17.08
200 breast	E Mattila	1992	5:03.19	M Merlino	1992	5:00.63	5:00.63	M Merlino	1992	5:07.83	5:01.36
50 fly	K Pelton	1986	1:06.25	M Merlino	1992	1:05.04	1:05.04	K Pelton	1987	1:16.09	1:13.71
100 fly	K Pelton	1986	2:36.36	M Merlino	1992	2:30.84	2:30.84	M Merlino	1992	2:37.32	2:37.32
200 fly	E Mattila	1991	5:33.46	M Merlino	1992	5:22.65	5:22.65	M Merlino	1992	5:29.93	5:29.93
100 IM	E Mattila	1990	2:14.16	M Merlino	1992	2:07.52	2:07.52				
200 IM	J Cooke	1989	4:51.27	M Merlina	1992	4:45.93	4:45.93	M Merlino	1992	4:47.02	4:47.02
400 IM	E Mattila	1990	9:53.28	M Merlino	1992	9:50.43	9:50.43	M Merlino	1992	10:05.13	10:05.13
			**					St.			
WOMEN 85-89		Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	A Soule	1991		M McKechnie	1989	1:03.78		A Soule	1991	:51.48	:51.48
100 free	A Soule	1991		A Bauscher	1989	3:01.15	3:01.15		1991	2:07.61	2:07.61
200 free	A Soule	1991		M McKechnie	1989	5:33.83		A Soule	1991	4:49.52	4:49.52
400/500 free	M McKechnie		14:15.17					E Peckham		13:22.48	
800/1000 free	M McKechnie			M McKechnie	1989	24:05.34	24:05.34	A Bauscher		24:23.38	
1500/1650 free	E Peckham		50:54.73					A Bauscher	1991	52:15.77	
50 back	A Soule	1991		M McKechnie	1989	1:13.57		A Soule	1991	:58.42	:58.42
100 back	A Soule	1991		A Bauscher	1989	2:52.17		A Soule	1991	2:13.13	2:13.13
200 back	A Saule	1991		M McKechnie	1989	6:00.16	6:00.16		1991	4:47.82	4:47.82
50 breast	M Poliock	1992		K Pelton	1990	1:37.05		E Peckham	1984	1:42.40	1:26.13
100 breast	K Pelton	1991		K Pelton	1990	3:09.62		K Pelton	1991	3:18.97	3:06.40
200 breast	K Pelton	1991	6:12.44					K Pelton	1991	6:58.50	7:15.13
50 fly	E Peckham	1985		K Pelton	1990	1:24.53		E Peckham	1985	1:27.77	1:27.77
100 fly	E Peckham	1984	3:01.71	K Pelton	1990	3:29.58		K Pelton	1991	3:01.14	3:01.14
200 fly	K Pelton	1991		K Pelton	1990	7:15.07		K Pelton	1990	7:18.41	7:18.41
100 IM											
TOO IM	E Peckham	1984	2:41.31		1990	3:00.23	3:00.23				
200 IM	E Peckham E Peckham	1984 1985		K Pelton A Bauscher	1990 1989	3:00.23 9:49.36		K Pelton	1991	6:44.53	6:44.53
		1985		A Bauscher	1989		9:49.36		100,000	6:44.53 14:02.65	120000000000000000000000000000000000000

99

WOMEN 90-94	SC-Yards	Year	USMS	SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	LTyra	1983	1:27.65				2:06.95	P Miller	1988	2:02.38	2:02.38
100 free	A Bauscher	1993	3:12.36				4:23.67	P Miller	1988	4:08.22	4:08.22
200 free	A Bauscher	1993	6:26.12								
400/500 free	A Bauscher	1992	15:48.03								
800/1000 free	A Bauscher	1993	32:53.76				Í				
1500/1650 free	[1				ł				
50 back	A Bauscher	1993	1:29.44				1:55.07	P Miller	1989	2:17.25	2:01.70
100 back	P Miller	1988	3:32.00				4:19.46				3:59.89
200 back	P Miller	1988	7:33.41					P Miller	1989	10:47.76	10:47.76
50 breast	L Tyra	1984	2:26.52				1:49.01				
100 breast	L Tyra	1983	5:30.32				4:05.59				
200 breast	L Tyra	1983	11:48.36				1				
50 fly	A Bauscher	1993	4:13.58				-				
100 fly			}				l l				
200 fly	ĺ						Į.				
100 IM	A Bauscher	1993	5:22.45				ì				
200 IM	A Bauscher	1993	10:43.74				- 1				
400 IM	ł		1								

SC-Yards	Year	USMS SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
M Collins	1989	16:46.74 J Poppell	1993						
J Keppeler	1992	:24.19 K Clear	1991	:29.62			1987	:28.06	
J Keppeler	1992		1993	1:00.67	Į(C Stevenson	1987		
J Keppeler	1992	1:50.28 J Poppell	1993	2:10.62	le	C Stevenson	1987	2:15.36	
B Doan	1993	:26.98 M Ewing	1991	:31.68			1987	:30.10	
N Williams	1992	:58.69 T Anderson	1992	1:09.02	l.	J Surowiec	1988	1:06.61	
B Doan	1993	2:10.76 M Collins	1989	2:36.23	l.	J Harlow	1992	2:30.64	
A Werth	1992	:23.14 J Roddin	1992	:26.94	[8	R Kneipp	1993	:26.44	
J Roddin	1992	:50.58 J Poppell	1993	:57.54	Į7	T Batis	1989	:58.16	
S Reed	1993	1:51.04 J Poppell	1993	2:07.64	Į.	K Duncan	1988	2:09.49	
A Werth	1992	:52.01 G Mackem	1991	1:00.93	- 1				
J Roddin	1992	1:54.64 J Poppell	1993	2:11.25	l (G Mackem	1992	2:14.08	
J Keppeler	1992	4:04.34 J Poppell	1993	4:44.27	K	G Mackem	1992	4:48.56	
SC-Yards	Year	USMS SC-Meters	Year	USMS	World I	LC-Meters	Year	USMS	World
R Peel	1991	:19.83 R Peel	1991	:23.16	:23.16	K DeForrest	1983	:22.59	:22.59
R Peel	1991	:44.39 M Noetzel	1990	:52.29	:51.62	J Montgomery	1981	:51.25	:51.25
F Mortensen	1993	1:39.38 B Wells	1989	1:54.00	1:53.82	J Keppeler	1992	1:52,17	1:52.17
F Mortensen	1993	4:31.90 R Mackle	1992	4:07.81	4:04.50	C Reid	1987	4:07.73	4:06.99
F Mortensen	1993	9:26.80 P Robinson	1993	8:41.80	8:29.19	J Erwin	1992	8:36.83	8:36.83
B Patten	1990	15:46.91 R Mackle	1992	16:23.21	16:23.21	C Reid	1987	16:28.69	16:28.69
M Rhodenbaugh	1991	:23.23 M Rhodenbau	igh 1992	:26.85	:26.85	R Hauck	1993	:27.42	:27.39
A Gill	1992	:49.83 C Britt	1989	:58.42	:58.15	J Keppeler	1992	:58.24	:58.24
R Hauck	1993	1:50.32 B Wells	1989	2:09.12	2:04.07	J Keppeler	1992	2:07.57	2:07.57
G Rhodenbaugh	1991	:25.34 J Waldman	1989	:29.08			1992	:29.77	:29.77
	1990		1989	1:05.09			1989	1:04.60	1:04.60
	1988		1989	2:24.68			1982	2:30.96	2:26.73
									:25.16
									:56.34
B Patten	1990	1:49.21 T O'Brien	1988	2:10.91	2:07.65		1982	2:06.88	2:05.25
	. 550						. 502		500
M Rhodenhauch	1001	50 47 Hillov	1999	-58.92	·57 701				
M Rhodenbaugh C Reid	1991 1988	:50.47 J Lilley 1:52.55 C Britt	1989 1989	:58.82 2:12.28	:57.70 2:10.85	C Reid	1987	2:09.21	2:09.21
	B Kurza B Kurza J Keppeler R Drewelow M Cleavenger M Collins J Keppeler J Keppeler J Keppeler B Doan N Williams B Doan A Werth J Roddin S Reed A Werth J Roddin J Keppeler SC-Yards R Peel R Peel F Mortensen F Mortensen F Mortensen B Patten M Rhodenbaugh A Gill R Hauck G Rhodenbaugh D Lundberg D Soltis C Cobb S Knowles	B Kurza 1993 B Kurza 1993 J Keppeler 1992 R Drewelow 1992 M Cleavenger 1987 M Collins 1989 J Keppeler 1992 J Keppeler 1992 J Keppeler 1992 J Keppeler 1993 B Doan 1993 N Williams 1993 N Williams 1992 J Roddin 1992 J Repeler 1992 Heppeler 1995 F Mortensen 1993 R Peel 1991 R Peel 1991 R Peel 1991 R Mortensen 1993 F Mortensen 1993 B Patten 1990 M Rhodenbaugh 1991 A Gill 1992 R Hauck 1993 G Rhodenbaugh 1991 L Lundberg 1990 D Soltis 1988 C Cobb 1991 S Knowles 1991	B Kurza 1993 :20.73 R Sprout B Kurza 1993 :45.63 J Poppell J Keppeler 1992 1:41.45 J Poppell R Drewelow 1992 4:38.46 J Poppell M Cleavenger 1987 9:49.98 J Poppell M Collins 1989 16:46.74 J Poppell J Keppeler 1992 :24.19 K Clear J Keppeler 1992 :25.028 J Poppell J Keppeler 1992 :50.58 J Poppell J Keppeler 1993 :26.98 M Ewing N Williams 1992 :50.58 J Poppell A Werth 1992 :50.58 J Poppell A Werth 1992 :50.58 J Poppell S Reed 1993 1:51.04 J Poppell J Roddin 1992 :52.01 G Macker J Roddin 1992 :52.01 J Macker J Roddin 1992 :54.64 J Poppell SC-Y	B Kurza 1993 :20.73 R Sprout 1989 B Kurza 1993 :45.63 J Poppell 1993 J Keppeler 1992 1:41.45 J Poppell 1993 M Cleavenger 1987 9:49.98 J Poppell 1993 M Collins 1989 16:46.74 J Poppell 1993 J Keppeler 1992 :24.19 K Clear 1991 J Keppeler 1992 :51.35 J Poppell 1993 J Keppeler 1992 :51.35 J Poppell 1993 J Keppeler 1992 :50.28 J Poppell 1993 J Keppeler 1992 :50.89 M Ewing 1991 1993 J Keppeler 1992 :58.69 M Collins 1992 190 A Werth 1992 :50.58 J Poppell 1993 J Roddin 1992 :50.04 J Poppell 1993 J Roddin 1992 :52.01 G Mackem 1991 J Rodd	B Kurza 1993 :20,73 R Sprout 1989 :24,62 B Kurza 1993 :45,63 J Poppell 1993 :53,12 J Keppeler 1992 1:41,45 J Poppell 1993 1:56,27 M Creavenger 1987 9:49,98 J Poppell 1993 4:08,28 M Collins 1989 16:46,74 J Poppell 1993 8:39,19 M Collins 1989 16:46,74 J Poppell 1993 8:39,19 M Koppeler 1992 :24,19 J Poppell 1993 10:15,25 J Keppeler 1992 :51,35 J Poppell 1993 1:06,27 J Keppeler 1992 :50,28 J Poppell 1993 1:06,27 J Keppeler 1992 :50,28 J Poppell 1993 1:06,29 B Doan 1993 :210,76 M Collins 1993 2:31,68 J Roddin 1992 :50,58 J Poppell 1993 :57,54 S Reed 199	B Kurza	B Kurza	B Kurza 1993 :20.73 R Sprout 1989 :24.62 T Dalbey 1993 B Kurza 1993 :45.63 J Poppell 1993 :53.12 T Batis 1989 J Keppeler 1992 1:41.45 J Poppell 1993 1:56.27 T Batis 1989 R Drowelow 1992 4:38.46 J Poppell 1993 4:08.28 T Batis 1989 M Collins 1989 16:46.74 J Poppell 1993 8:39.19 S Finlayson 1992 J Keppeler 1992 :224.19 K Clear 1991 :29.62 C Stevenson 1987 J Keppeler 1992 :51.35 J Poppell 1993 1:06.67 C Stevenson 1987 J Keppeler 1992 :50.28 J Poppell 1993 2:10.62 C Stevenson 1987 J Keppeler 1992 :50.28 J Poppell 1993 2:10.62 C Stevenson 1987 J Keppeler 1992 :55.69 T Anderson	B Kurza

MEN 30-34	SC-Yards	Year	USMS SC-Meters	Year	USMS	World LC-Meters	Year	USMS	World
50 free	J Smith	1992	:20.90 R Killeen	1993	:23.59	:22.82 R Gaines	1990	:23.21	:23.21
100 free	J Montgomery	1985	:45.29 J Montgomery	1989	:51.86	:50.51 R Gaines	1991	:51.50	:51.50
200 free	J Montgomery	1988	1:39.97 D Stephenson	1989	1:53.66	1:50.91 R Gaines	1990	1:54.04	1:54.04
400/500 free	S Fisher	1992	4:39.38 D Goerke	1989	4:13.61	4:02.66 J Montgomery		4:08.70	4:08.70
800/1000 free	C Reid	1991	9:38.13 D Stephenson	1989	8:34.26	8:34.26 J Montgomery		8:46.99	8:46.99
1500/1650 free	J Kegley		16:06.55 S Fisher			17:05.25 B Patten		16:36.06	
50 back	C Britt	1992	:23.39 C Britt	1991	:27.18	:27.18 D Ozier	1988	:27.32	:27.32
100 back	C Britt	1992	:50.21 C Britt	1991	:58.12	:58.12 J Yarid	1993	1:00.03	1:00.03
200 back	J Yarid	1993	1:50.57 J Fowler	1992	2:11.19	2:11.19 J Yarid	1993	2:09.84	2:09.84
50 breast	D Lundberg	1991	:25.88 G Rhodenbaugh	1993	:29.62	:29.62 D Guthrie	1992	:29.42	:29.42
100 breast	D Lundberg	1991	:56.58 D Guthrie	1993	1:04.33	1:04.33 D Lundberg	1991	1:05.65	1:05.65
200 breast	D Lundberg	1991	2:02.32 J Shore	1989	2:30.18	2:24.92 D Lundberg	1991	2:24.06	2:24.06
50 fly	R Placak	1989	:22.66 M Bottom	1989	:25.06	:25.06 M Bottom	1988	:25.31	:25.31
100 fly	W Specht	1989	:49.84 M Bottom	1989	:56.43	:56.43 M Bottom	1988	:56.64	:56.64
200 fly	B Patten	1993	1:50.32 M Schuman	1988	2:13.62	2:13.62 B Patten	1993	2:07.43	2:07.43
100 IM	D Lundberg	1991	:50.98 C Britt	1992	:59.95	:59.95			
200 IM	D Lundberg	1991	1:50.45 T Weissert	1988	2:12.33	2:12.33 D Lundburg	1991	2:09.69	2:09.69
400 IM	T Fristoe	1991	4:00.04 A Jaegers	1992	4:44.78	4:44.78 D Lundberg	1992	4:40,44	4:40.44
	•		•			•			
MEN 35-39	SC-Yards	Year	USMS SC-Meters	Year	USMS	World LC-Meters	Year	USMS	World
50 free	SC-Yards S Marvin	1991	:21.19 B Vickery	1989	:23.98	:23.98 B Stahl	1993	:24.27	:24.56
			:21.19 B Vickery :46.43 B Vickery	1989 1989	:23.98 :53.94	:23.98 B Stahl :53.94 B Stahl	1993 1993	:24.27 :54.01	:24.56 :54.28
50 free 100 free 200 free	S Marvin S Marvin J Montgomery	1991 1991 1990	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood	1989 1989 1989	:23.98 :53.94 1:59.38	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor	1993 1993 1992	:24.27 :54.01 1:57.95	:24.56 :54.28 1:57.95
50 free 100 free	S Marvin S Marvin	1991 1991	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland	1989 1989 1989 1991	:23.98 :53.94 1:59.38 4:18.22	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor	1993 1993 1992 1992	:24.27 :54.01 1:57.95 4:15.49	:24.56 :54.28 1:57.95 4:15.49
50 free 100 free 200 free	S Marvin S Marvin J Montgomery	1991 1991 1990	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland	1989 1989 1989	:23.98 :53.94 1:59.38	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor	1993 1993 1 1992 1 1992 1 1992	:24.27 :54.01 1:57.95 4:15.49 8:52.22	:24.56 :54.28 1:57.95 4:15.49 8:52.22
50 free 100 free 200 free 400/500 free	S Marvin S Marvin J Montgomery H Yntema	1991 1991 1990 1991 1989	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland	1989 1989 1989 1991	:23.98 :53.94 1:59.38 4:18.22	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor	1993 1993 1 1992 1 1992 1 1989	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29
50 free 100 free 200 free 400/500 free 800/1000 free	S Marvin S Marvin J Montgomery H Yntema J McConica	1991 1991 1990 1991 1989	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald	1989 1989 1989 1991 1992	:23.98 :53.94 1:59.38 4:18.22 9:02.71	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor	1993 1993 1 1992 1 1992 1 1992 1989 1978	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema	1991 1991 1990 1991 1989 1991	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland	1989 1989 1989 1991 1992 1991 1993 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica	1993 1993 1 1992 1 1992 1 1989	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht	1991 1991 1990 1991 1989 1991 1993	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht	1989 1989 1989 1991 1992 1991 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann	1993 1993 1992 1992 1992 1989 1978 1993	:24,27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht	1991 1991 1990 1991 1989 1991 1993 1993	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht	1989 1989 1989 1991 1992 1991 1993 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht	1993 1993 1 1992 1 1992 1 1992 1989 1978 1993	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back	S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht	1991 1990 1990 1991 1989 1991 1993 1993	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht 1:53.46 W Specht	1989 1989 1989 1991 1992 1991 1993 1993 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf	1993 1993 1992 1992 1992 1989 1978 1993	:24,27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell	1991 1990 1991 1989 1991 1993 1993 1993 1992	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht 1:53.46 W Specht :26.63 R Rachner	1989 1989 1989 1991 1992 1991 1993 1993 1993 1988	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01 :31.64	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm	1993 1993 1992 1992 1992 1989 1978 1993 1990	:24,27 :54,01 1:57,95 4:15,49 8:52,22 17:26,29 :28,04 1:00,95 2:13,83 :30,79	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast	S Marvin S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell M Schuman	1991 1991 1990 1991 1989 1991 1993 1993 1993 1992 1991	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht 1:53.46 W Specht 1:56.46 R Rachner :59.07 S Corliss	1989 1989 1989 1991 1992 1991 1993 1993 1993 1988 1992	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01 :31.64 1:08.40	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm 1:08.30 M Schuman	1993 1993 1992 1 1992 1992 1989 1978 1993 1990 1992	:24,27 :54,01 1:57,95 4:15,49 8:52,22 17:26,29 :28,04 1:00,95 2:13,83 :30,79 1:07,90	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	S Marvin S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell M Schuman M Schuman	1991 1991 1990 1991 1989 1991 1993 1993 1993 1992 1991	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht 1:53.46 W Specht :26.63 R Rachner :59.07 S Corliss 2:10.41 G Harrison	1989 1989 1989 1991 1992 1991 1993 1993 1993 1988 1992	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01 :31.64 1:08.40 2:28.35	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm 1:08.30 M Schuman 2:28.35 M Schuman	1993 1993 1992 1 1992 1989 1978 1990 1992 1992 1992 1993 1993	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 free	S Marvin S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell M Schuman M Schuman W Specht	1991 1991 1990 1991 1989 1993 1993 1993 1993 1992 1991 1991	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht 1:53.46 W Specht :26.63 R Rachner :59.07 S Corliss 2:10.41 G Harrison :22.93 W Specht	1989 1989 1989 1991 1992 1993 1993 1993 1988 1992 1989 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01 :31.64 1:08.40 2:28.35 :25.89	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm 1:08.30 M Schuman 2:28.35 M Schuman :25.89 M Bottom	1993 1993 1992 1992 1992 1989 1978 1993 1990 1992 1992 1992	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly	S Marvin S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell M Schuman M Schuman W Specht W Specht	1991 1991 1990 1991 1989 1993 1993 1993 1992 1991 1991 1993 1993	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht :56.63 R Rachner :59.07 S Corliss 2:10.41 G Harrison :22.93 W Specht	1989 1989 1989 1991 1992 1993 1993 1993 1988 1992 1989 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01 :31.64 1:08.40 2:28.35 :25.89 :57.02	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm 1:08.30 M Schuman 2:28.35 M Schuman :25.89 M Bottom :57.02 W Specht	1993 1993 1992 1 1992 1989 1978 1990 1992 1992 1992 1993 1993	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	S Marvin S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell M Schuman M Schuman W Specht W Specht W Specht W Specht W Specht	1991 1991 1990 1991 1989 1993 1993 1993 1992 1991 1993 1993 199	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht 1:53.46 W Specht :26.63 R Rachner :59.07 S Corliss 2:10.41 G Harrison :22.93 W Specht 1:50.50 W Specht 1:52.17 W Specht	1989 1989 1989 1991 1992 1991 1993 1993 1993 1989 1992 1989 1993 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 1:27.54 1:00.65 2:10.01 :31.64 1:08.40 2:28.35 :25.89 :57.02 2:06.97	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm 1:08.30 M Schuman 2:28.35 M Schuman :25.89 M Bottom :57.02 W Specht 2:06.97 J Belardi	1993 1993 1992 1 1992 1989 1978 1990 1992 1992 1992 1993 1993	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly 100 IM	S Marvin S Marvin S Marvin J Montgomery H Yntema J McConica H Yntema W Specht W Specht W Specht B Howell M Schuman M Schuman W Specht W Specht W Specht M Specht M Specht	1991 1991 1990 1991 1989 1991 1993 1993 1992 1991 1993 1993 199	:21.19 B Vickery :46.43 B Vickery 1:42.78 L Wood 4:41.53 R Copeland 10:05.99 S MacDonald 16:21.14 R Copeland :24.16 W Specht :51.96 W Specht :55.46 W Specht :26.63 R Rachner :59.07 S Corliss 2:10.41 G Harrison :22.93 W Specht :50.50 W Specht :52.17 W Specht	1989 1989 1989 1991 1992 1991 1993 1993 1993 1988 1992 1989 1993 1993	:23.98 :53.94 1:59.38 4:18.22 9:02.71 17:25.79 :27.54 1:00.65 2:10.01 31.64 1:08.40 2:28.35 :25.89 :57.02 1:00.79	:23.98 B Stahl :53.94 B Stahl 1:59.38 D Stephensor 4:18.22 D Stephensor 9:02.71 D Stephensor 17:25.79 J McConica :27.54 T Mann 1:00.65 W Specht 2:10.01 T Wolf :30.10 D Malcolm 1:08.30 M Schuman :25.89 M Sotuman :25.89 M Bottom :57.02 W Specht 2:06.97 J Belardi 1:00.79	1993 1993 1993 1992 1992 1989 1978 1993 1990 1992 1992 1993 1993 1993	:24.27 :54.01 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44 2:09.18	:24.56 :54.28 1:57.95 4:15.49 8:52.22 17:26.29 :28.04 1:00.95 2:13.83 :30.79 1:07.90 2:33.05 :25.93 :57.44 2:09.18

MEN 40 44	SC Yards	Year	USMS SC Meters	Year	USMS		LC Meters	Year	USMS	World
50 free	Whatley/Shulman	92/93	21 72 J Heidenreich	1993	24 81		T Whatley	1992	24 93	24 93
100 free	J Griffith	1993	48 52 C Miltenberger	1993	55 02		C Miltenberger	1993	56 25	56 00
200 free	T Broderick	1993	1 47 17 T Broderick	1992	1 59 27		T Broderick	1993	2 03 28	2 03 28
400/500 free	D Gray	1987	4 50 80 K Polansky	1989	4 18 45		T Broderick	1993	4 24 26	4 24 26
800/1000 free	K Polansky	1992	10 17 35 K Polansky	1989	9 01 20	9 01 20	K Polansky	1990	9 19 37	9 19 37
1500/1650 free	K Polansky	1990	17:02 40 D Gray	1987	17 38 17		K Polansky	1990	17 30 13	
50 back	J Heidenreich	1991	25 61 J Heidenreich	1991	28 93	28 93	P O'Keeffe	1990	29 38	29 38
100 back	P O Keefe	1991	54 15 R Cooley	1989	1 04 50	1 04 14	P O Keeffe	1990	1 03 39	1 03 39
200 back	P O'Keefe	1991	2 01 54 T Spieker	1989	2 22 17	2 22 17	P O'Keeffe	1990	2 18 17	2 18 17
50 breast	C Miltenberger	1992	27 45 C Miltenberger	1993	30 80	30 80	P Dahlberg	1992	30 82	30 82
100 breast	C Miltenberger	1993	59 40 C Miltenberger	1993	1 07 98	1.07 98	P Dahlberg	1992	1 09 95	1 09 95
200 breast	R Colella	1992	2 12.85 G Harrison	1993	2 31 37	2:31 37	R Colella	1992	2 32.17	2 32 17
50 fly	D Thompson	1991	23 63 J Heidenreich	1993	26 66	26 66	J Foote	1991	27 04	27 04
100 fly	J Griffith	1993	53 77 A McPherson	1989	1 00 79	1 00 79	L Larson	1980	1 02.05	1 02 05
200 fly	B Gallas	1990	2 02 09 B Gallas	1989	2 16 15	2 16 15	E Brown	1993	2 20 81	2 20 81
100 IM	T Whatley	1992	55 59 R Cooley	1989	1 02 30	1 02 30				
200 IM	P O'Keefe	1991	2 03 31 J Calvert	1989	2 18 73	2 18 73	R Colella	1992	2 18 92	2 18 92
400 IM	B Mallette	1993	4 27 29 J Calvert	1989	5 00 76	5.00 76	R Colella	1992	4 57 46	4 57 46
	1									
MEN 45-49	SC-Yards	Year	USMS SC Meters	Year	USMS		LC Meters	Year	USMS	World
50 free	R Abrahams	1990	21 87 R Abrahams	1991	25 07		R Abrahams	1990	25 30	25 30
100 free	A McPherson	1992	48 13 A McPherson	1992	56 45		A McPherson	1992	57 04	57 04
200 free	A McPherson	1992	1 49 27 E Cazalet	1988	2 05 81		T Garton	1990	2 07 18	2 07 18
400/500 free	B Momsen	1992	5 03 69 E Cazalet	1989	4 33 39		B Momsen	1992	4 27 70	4 27 70
800/1000 free	E Crossmore	1993	10 43 60 R Boyd	1989	9 32 34	9 26 18	B Momsen	1992	9 31 38	9 31 38
1500/1650 free	W Steuart	1983	17 59 11 H Winn	1987	18 27 36	18 10 24	T Spieker	1993	18 27 49	18 34 73
50 back	R Smith	1988	25 65 R Smith	1989	29 33	29 33	H Wilder	1993	30 42	30 42
100 back	R Smith	1988	56 14 R Smith	1989	1 05 31	1 05 31	H Wilder	1992	1 06 00	1 06 00
200 back	J Calvert	1992	2 05 50 T Birnie	1992	2 24 39	2 24 39	J Calvert	1992	2 26 91	2 26 91
50 breast	R Nesbit	1991	28 32 P Henne	1991	32 23	31 95	R Nesbit	1991	32.76	32 76
100 breast	M Hull	1989	1 02 48 R Strand	1992	1 10 41	1 10 41	R Strand	1992	1 12.98	1 12 98
200 breast	R Strand	1993	2 18 37 R Strand	1992	2 35 71	2 35 71	P Wisner	1992	2 41 88	2 41 88
50 fly	M Hull	1989	24 24 D Thompson	1993	27 08		D Thompson	1992	27 12	27 12
100 fly	M Hull	1989	54 27 R Abrahams	1993	1 03 36		A McPherson	1992	1 02.84	1 02 84
200 fly	B Graner Gallas	1993	2 03 96 A McPherson	1992	2 25 95		A McPherson	1993	2 29 52	2 27 56
	R Smith	1988	56 23 R Strand	1992	1 05 45	1 05 45				
100 IM										
100 IM							R Momeon	1992	2 24 39	2 24 39
100 IM 200 IM 400 IM	A McPherson	1988 1988		1991 1989	2 24 45 5 17 02	2 24 45	B Momsen B Momsen	1992 1992	2 24 39 5 12.03	2 24 39 5 12 03

	SC Yards	Year	USMS SC Mete	rs Year	USMS	World	LC Meters	Year	USMS	World
50 free	R Smith	1993	22 84 J Farrell	1988	26 35	26 35	D Hill	1983	26 16	26 16
100 free	T Garton	1993	51 32 E Cazale	t 1992	59 58	59 21	T Garton	1993	58 62	58 62
200 free	T Garton	1993	1 53 42 E Cazale	t 1992	2 12 18	2 12 18	T Garton	1993	2 09 74	2 09 74
400/500 free	E Hinshaw	1990	5 13 80 E Cazale	t 1992	4 40 16	4 40 16	T Garton	1992	4 43 72	4 43 72
800/1000 free	E Hinshaw	1987	11:00 03 E Cazale	t 1992	9 49 95	9 49 95	T Garton	1992	9 55 59	9 55 59
1500/1650 free	S Galletly	1993	18 28 45 B Jones	1985	19 16 63	19 04 02	E Cazalet	1993	19 19 43	18 49 43
50 back	R Smith	1993	26 24 J Smith	1989	31 42		J Smith	1988	30 93	30 93
100 back	R Smith	1993	59 49 J Smith	1989	1 10 07	1 09 38	R Burns	1993	1 09 82	1 09 82
200 back	E Cazalet	1993	2 12.97 E Cazale	t 1992	2 33 18	2:30 21	R Burns	1993	2 32.81	2 32 81
50 breast	M Sanguily	1984	29 70 M Sangu	ily 1987	34 15	33 09	M Sanguily	1983	33 85	33 38
100 breast	M Sanguily	1984	1 05 29 D Gallag	her 1989	1 14 72	1 14 72	M Sanguily	1983	1 15 60	1 15 60
200 breast	D Gallagher	1989	2 28 78 D Gallag	her 1989	2 45 11	2 45 11	R Boyd	1993	2 52.64	2 51 68
50 fly	M Mealiffe	1991	25 50 R Proebs	iting 1988	29 34	28 65	K Lodwig	1993	28 19	28 19
100 fly	T Garton	1993	57 34 R Proebs	ting 1989	1 06 66	1 05 10	T Garton	1992	1 05 83	1 05 83
200 fly	J Geoghegan	1992	2 13 71 R Proebs	iting 1989	2 36 01	2 29 99	B Yorzyk	1983	2 33 79	2 32 65
100 IM	T Garton	1993	58 15 D Gallag	her 1989	1 07 60	1.07 60	-			
200 IM	T Garton	1993	2 08 36 D Gallag	her 1989	2 31 52	2 31 52	R Garton	1993	2 28 70	2 28 70
400 IM	T Garton	1993	4 39 70 D Gallag	her 1989	5 20 81	5 20 81	T Garton	1993	5 25 32	5 25 32
	•		•				•			
	SC-Yards	Year	USMS SC-Mete		USMS		LC-Meters	Year	USMS	World
50 free	D Hill	1987	23 41 D Hill	1989	26 60	26 60	M Muckleroy	1988	27 42	27 42
50 free 100 free	D Hill D Hill	1987 1987	23 41 D Hill 52 59 D Hill	1989 1989	26 60 1 00 08	26 60 1 00 08	M Muckleroy B Bailie	1988 1991	27 42 1 01 95	27 42 1 01 95
50 free 100 free 200 free	D Hill D Hill J Farrell	1987 1987 1993	23 41 D Hill 52 59 D Hill 2 01 63 D Harriso	1989 1989 on 1992	26 60 1 00 08 2 21 51	26 60 1 00 08 2 17 95	M Muckleroy B Bailie B Jones	1988 1991 1990	27 42 1 01 95 2 21 53	27 42 1 01 95 2 21 33
50 free 100 free 200 free 400/500 free	D Hill D Hill J Farrell B Jones	1987 1987 1993 1988	23 41 D Hill 52 59 D Hill 2 01 63 D Harriso 5 32.17 G Johnsi	1989 1989 on 1992 on 1987	26 60 1 00 08 2 21 51 5 00 88	26 60 1 00 08 2 17 95 4 59 35	M Muckleroy B Bailie B Jones B Jones	1988 1991 1990 1988	27 42 1 01 95 2 21 53 4 58 41	27 42 1 01 95 2 21 33 4 58 41
50 free 100 free 200 free 400/500 free 800/1000 free	D Hill D Hill J Farrell B Jones B Jones	1987 1987 1993 1988 1990	23 41 D Hill 52 59 D Hill 2 01 63 D Harrisc 5 32.17 G Johnsi 11 26 99 G Johnsi	1989 1989 on 1992 on 1987 on 1987	26 60 1 00 08 2 21 51 5 00 88 10 35 62	26 60 1 00 08 2 17 95 4 59 35 10 35 62	M Muckleroy B Bailie B Jones B Jones B Jones	1988 1991 1990 1988 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08	27 42 1 01 95 2 21 33 4 58 41 10 27 08
50 free 100 free 200 free 400/500 free	D Hill D Hill J Farrell B Jones	1987 1987 1993 1988 1990	23 41 D Hill 52 59 D Hill 2 01 63 D Harriso 5 32.17 G Johnsi	1989 1989 on 1992 on 1987	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24	26 60 1 00 08 2 17 95 4 59 35	M Muckleroy B Bailie B Jones B Jones B Jones	1988 1991 1990 1988 1988 1990	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72
50 free 100 free 200 free 400/500 free 800/1000 free	D Hill D Hill J Farrell B Jones B Jones	1987 1987 1993 1988 1990 1988 1991	23 41 D Hill 52 59 D Hill 2 01 63 D Harriso 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka	1989 1989 on 1992 on 1987 on 1987 1990 wa 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka	1988 1991 1990 1988 1988 1990 1992	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa	1987 1987 1993 1988 1990 1988 1991 1991	23 41 D Hill 52 59 D Hill 2 01 63 D Harrisc 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka	1989 1989 1989 on 1992 on 1987 on 1987 1990 wa 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattie	1988 1991 1990 1988 1988 1990 1992 1990	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa	1987 1987 1993 1988 1990 1988 1991 1991	23 41 D Hill 52 59 D Hill 2 01 63 D Harriso 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka	1989 1989 on 1992 on 1987 on 1987 1990 wa 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattle D Brown	1988 1991 1990 1988 1988 1990 1992 1990 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa	1987 1987 1993 1988 1990 1988 1991 1991	23 41 D Hill 52 59 D Hill 2 01 63 D Harris 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beattle 30 18 M Sangu	1989 1989 1989 1992 1987 1987 1990 wa 1989 wa 1989 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattie	1988 1991 1990 1988 1988 1990 1992 1990 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa D Brown	1987 1987 1993 1988 1990 1988 1991 1991	23 41 D Hill 52 59 D Hill 2 01 63 D Harriss 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beattle	1989 1989 1989 1992 1987 1987 1990 wa 1989 wa 1989 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattie D Brown J Kortheuer J Kortheuer	1988 1991 1990 1988 1988 1990 1992 1990 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa D Brown M Sanguly	1987 1987 1993 1988 1990 1988 1991 1991 1991	23 41 D Hill 52 59 D Hill 2 01 63 D Harris 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beattle 30 18 M Sangu	1989 1989 1989 1992 1987 1987 1990 wa 1989 1989 1989 1989 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11 33 77	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattle D Brown J Kortheuer	1988 1991 1990 1988 1988 1990 1992 1990 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa D Brown M Sanguily M Sanguily	1987 1987 1993 1988 1990 1988 1991 1991 1991 1989	23 41 D Hill 52 59 D Hill 2 01 63 D Harris 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beatte 30 18 M Sangu 1 06 93 M Sangu	1989 1989 1989 1992 1987 1987 1990 wa 1989 1989 1989 1989 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11 33 77 1 16 32	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32 2 51 47	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattie D Brown J Kortheuer J Kortheuer	1988 1991 1990 1988 1988 1990 1992 1990 1988 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20 30 17
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	D Hill D Hill J Farrell B Jones B Jones Y Oyakawa Y Oyakawa D Brown M Sanguily M Sanguily M Sanguily	1987 1987 1993 1988 1990 1988 1991 1991 1999 1989 1989	23 41 D Hill 52 59 D Hill 2 01 63 D Harriss 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 00 56 J Beattle 30 18 M Sangu 1 06 93 M Sangu 2.34 15 M Sangu	1989 1989 1989 1989 1987 1987 1990 1987 1989 1989 1989 1989 1989 1989 1989	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11 33 77 1 16 32 2 51 47	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32 2 51 47 30 15 1 13 47	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattle D Brown J Kortheuer J Kortheuer M Sanguily R Proebsting R Proebsting	1988 1991 1990 1988 1988 1990 1992 1990 1988 1988 1988 1988 1992	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87 2 58 83 30 17 1 10 28	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20 30 17 1 10 28
50 free 100 free 200 free 200 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 free	D Hill D Hill J Farrell B Jones B Jones S Jones Y Oyakawa Y Oyakawa D Brown M Sanguily M Sanguily M Sanguily R Proebsting	1987 1987 1993 1988 1990 1988 1991 1991 1991 1989 1989	23 41 D Hill 52 59 D Hill 2 01 63 D Harriss 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beattle 30 18 M Sangu 1 06 93 M Sangu 2.34 15 M Sangu 26 58 R Bailie	1989 1989 1989 1987 1990 1987 1990 wa 1989 1989 1989 1989 1990 1990	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11 33 77 1 16 32 2 51 47 30 15	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 243 1 12 17 2 41 11 33 17 1 16 32 2 51 47 2 13 47 2 53 71	M Muckleroy B Bailie B Jones B Jones B Jones B Jones J Y Oyawaka J Beattle D Brown J Kortheuer J Kortheuer M Sanguily R Proebsting	1988 1991 1990 1988 1988 1990 1992 1990 1988 1988 1988 1988	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87 2 58 83 30 17	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20 30 17
50 free 100 free 200 free 200 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 200 breast 200 breast 200 breast 200 free	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa D Brown M Sanguily M Dobler	1987 1987 1993 1988 1990 1988 1991 1991 1991 1989 1989	23 41 D Hill 52 59 D Hill 2 01 63 D Harriss 5 32.17 G Johns 11 26 99 G Johns 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beattle 30 18 M Sangu 1 06 93 M Sangu 2.34 15 M Sangu 2.6 58 R Ballle 1 00 88 D Costil	1989 1989 1989 1987 1990 1987 1990 wa 1989 1989 1989 1989 1990 1990	26 60 1 00 08 2 21 51 5 00 88 10 35 24 32 69 1 12 17 2 41 11 33 77 1 16 32 2 51 47 30 15 1 12 51	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32 2 51 47 30 15 1 13 47	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattle D Brown J Kortheuer J Kortheuer M Sanguily R Proebsting R Proebsting	1988 1991 1990 1988 1988 1990 1992 1990 1988 1988 1988 1988 1992	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87 2 58 83 30 17 1 10 28	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20 30 17 1 10 28
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa D Brown M Sanguily M Sanguily M Sanguily M Sanguily R Proebsting W Dobler R Proebsting	1987 1987 1993 1988 1990 1988 1991 1991 1999 1989 1989	23 41 D Hill 52 59 D Hill 2 01 63 D Harris 5 32.17 G Johnsi 11 26 99 G Johnsi 19 02 45 B Jones 28 15 Y Oyaka 2 02 56 J Beattle 30 18 M Sangu 1 06 93 M Sangu 2.34 15 M Sangu 26 58 R Baille 1 00 88 D Costil 2 21 48 M Sangu	1989 1989 1989 1989 1987 1990 1987 1989 1989 1989 1989 1990 1991 1991	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11 33 77 1 16 32 2 51 47 30 15 1 12 51 2 53 71	26 60 1 00 08 2 17 95 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32 2 51 47 30 15 1 13 47 2 53 71 1 12 67	M Muckleroy B Bailie B Jones B Jones B Jones B Jones Y Oyawaka J Beattle D Brown J Kortheuer J Kortheuer M Sanguily R Proebsting R Proebsting	1988 1991 1990 1988 1988 1990 1992 1990 1988 1988 1988 1988 1992	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87 2 58 83 30 17 1 10 28	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20 30 17 1 10 28
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly 100 IM	D Hill D Hill J Farrell B Jones B Jones B Jones Y Oyakawa Y Oyakawa O Brown M Sanguily M Sanguily M Sanguily R Proebsting W Dobler R Proebsting J Farrell	1987 1987 1993 1988 1990 1988 1991 1991 1999 1989 1989	23 41 D Hill 52 59 D Hill 2 01 63 D Harriss 5 32.17 G Johns 11 26 99 G Johns 19 02 45 B Jones 28 15 Y Oyaka 1 02.56 Y Oyaka 2 20 56 J Beattle 30 18 M Sangu 1 06 93 M Sangu 2.34 15 M Sangu 26 58 R Baille 1 00 88 D Costill 2 21 48 M Sangu 1 01 70 D Costill	1989 1989 1989 1989 1987 1990 1987 1990 1989 1989 1989 1990 1991 1919 1989 1991	26 60 1 00 08 2 21 51 5 00 88 10 35 62 20 03 24 32 69 1 12 17 2 41 11 33 77 1 16 32 2 51 47 30 15 1 12 51 2 53 71 1 12 57	26 60 1 00 08 2 17 9 35 4 59 35 10 35 62 20 03 24 32 43 1 12 17 2 41 11 33 17 1 16 32 2 51 47 30 15 1 13 47 2 53 71 1 12 67 2 41 86	M Muckleroy B Ballie B Jones B Jones B Jones B Jones Y Oyawaka J Beattle D Kortheuer J Kortheuer M Sanguily R Proebsting R Proebsting	1988 1991 1990 1988 1988 1990 1992 1990 1988 1988 1988 1988 1998 1999	27 42 1 01 95 2 21 53 4 58 41 10.27 08 19 54 72 32.94 1 13 15 2 42.37 34 20 1 17 87 2 58 83 30 17 1 10 28 2 48 42	27 42 1 01 95 2 21 33 4 58 41 10 27 08 19 54 72 32.94 1 13 15 2 42 37 33 03 1 17 87 2 56 20 30 17 1 10 28 2 48 42

MEN 60-64	SC-Yards	Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	D Hill	1993		F Piemme	1988	:28.86	:28.30		1992	:27.86	:27.86
100 free	D Hill	1993	:54.49	C Baldwin	1990	1:05.52	1:05.52		1992	1:02.80	1:02.80
200 free	P Powlison	1985		G Johnston	1991	2:21.77	2:21.77		1992	2:23.11	2:23.11
400/500 free	G Johnston	1991	5:38.17	G Johnston	1993	5:02.20		G Johnston	1991	5:02.70	5:05.54
800/1000 free	G Johnston	1991	11:51.48	W Phillips	1989			G Johnston	1991		
1500/1650 free	G Johnston	1992	19:41.57	G Johnston	1993			G Johnston	1991	20:06.80	
50 back	P Hutinger	1985	:30.65	P Hutinger	1986	:34.81		Y Oyakawa	1993	:33.74	:33.74
100 back	P Hutinger	1985	1:07.47	P Hutinger	1986	1:17.31		D Brown	1993	1:15.66	1:15.66
200 back	R Bennett	1991		G Johnston	1993	2:49.13		D Brown	1993	2:45.93	2:45.93
50 breast	M Sanguily	1993	:31.34	J Kortheuer	1991	:35.31		J Kortheuer	1991	:35.91	:35.91
100 breast	M Sanguily	1993	1:10.08	J Kortheuer	1991	1:18.77		J Kortheuer	1991	1:21.58	1:21.58
200 breast	M Sanguily	1993	2:39,95	J Kortheuer	1991	3:00.71		J Kortheuer	1991	3:08.59	3:08.59
50 fly	P Hutinger	1986	:28.50	J Kortheuer	1991	:32.34		F Piemme	1985	:32.19	:31.52
100 fly	J Korthever	1991	1:06.31	J Kortheuer	1991	1:15.69	1:16.56	W Wilson	1988	1:17.39	1:16.39
200 fly	J Masters	1991	2:38.59	H Hunsicker	1993	3:00.48	3:00.48	J Masters	1990	3:00.99	3:00.99
100 IM	P Hutinger	1986	1:06.39	J Kortheuer	1991	1:14.68	1:15.84				
200 IM	G Johnston	1993	2:29.46	G Johnston	1991	2:46.69		G Johnston	1993	2:50.08	2:50.08
400 IM	G Johnston	1993	5:21.45	G Johnston	1993	6:02.73	6:02.73	G Johnston	1991	6:04.99	6:04.99
	•										
MEN 65-69	SC-Yards	Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	P Powlison	1987	:25.62	F Piemme	1990	:29.63	:29.63	P Powlison	1987	:29.17	:28.94
50 free 100 free	P Powlison P Powlison	1987 1987	:25.62 :56.24	F Piemme F Piemme	1990 1990	:29.63 1:07.13	:29.63 1:07.13	P Powlison J Welch	1987 1983	:29.17 1:08.15	:28.94 1:08.15
50 free 100 free 200 free	P Powlison P Powlison P Powlison	1987 1987 1987	:25.62 :56.24 2:10.80	F Piemme F Piemme F Piemme	1990 1990 1990	:29.63 1:07.13 2:36.10	:29.63 1:07.13 2:36.10	P Powlison J Welch P Powlison	1987 1983 1987	:29.17 1:08.15 2:32.90	:28.94 1:08.15 2:32.90
50 free 100 free 200 free 400/500 free	P Powlison P Powlison P Powlison F Piemme	1987 1987 1987 1991	:25.62 :56.24 2:10.80 6:15.85	F Piemme F Piemme F Piemme E Kerswill	1990 1990 1990 1991	:29.63 1:07.13 2:36.10 5:37.93	:29.63 1:07.13 2:36.10 5:37.93	P Powlison J Welch P Powlison J Welch	1987 1983 1987 1983	:29.17 1:08.15 2:32.90 5:38.79	:28.94 1:08.15 2:32.90 5:38.79
50 free 100 free 200 free	P Powlison P Powlison P Powlison F Piemme R Franks	1987 1987 1987 1991 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78	F Piemme F Piemme F Piemme E Kerswill E Kerswill	1990 1990 1990 1991 1992	:29.63 1:07.13 2:36.10 5:37.93 11:51.42	:29.63 1:07.13 2:36.10 5:37.93 11:51.42	P Powlison J Welch P Powlison J Welch F Piemme	1987 1983 1987 1983 1993	:29.17 1:08.15 2:32.90 5:38.79 11:51.06	:28.94 1:08.15 2:32.90 5:38.79 11:35.97
50 free 100 free 200 free 400/500 free	P Powlison P Powlison P Powlison F Piemme	1987 1987 1987 1991 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme	1990 1990 1990 1991 1992 1992	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37	P Powlison J Welch P Powlison J Welch F Piemme W Wilson	1987 1983 1987 1983 1993 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	P Powlison P Powlison P Powlison F Piemme R Franks	1987 1987 1987 1991 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger	1990 1990 1990 1991 1992 1992 1990	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey	1987 1983 1987 1983 1993 1992 1989	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks	1987 1987 1987 1991 1993 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger	1990 1990 1990 1991 1992 1992 1990 1993	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68	P Powlison J Welch P Powlison J Welch F Piernme W Wilson G Gandsey R Franks	1987 1983 1987 1983 1993 1992 1989 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger	1987 1987 1987 1991 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger	1990 1990 1990 1991 1992 1992 1990	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks	1987 1983 1987 1983 1993 1992 1989 1992 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks	1987 1987 1987 1991 1993 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger	1990 1990 1990 1991 1992 1992 1990 1993	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks J Kurtzman	1987 1983 1987 1983 1993 1992 1989 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks R Franks	1987 1987 1987 1991 1993 1993 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger P Hutinger	1990 1990 1990 1991 1992 1992 1990 1993 1990	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks	1987 1983 1987 1983 1993 1992 1989 1992 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks J Kurtzman	1987 1987 1987 1991 1993 1993 1993 1993 1993	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24 1:17.34	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger J Kurtzman	1990 1990 1990 1991 1992 1992 1990 1993 1990	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48 1:27.85	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks J Kurtzman	1987 1983 1987 1983 1993 1992 1989 1992 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46 :38.28	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks J Kurtzman J Kurtzman	1987 1987 1987 1991 1993 1993 1993 1993 1993 1993 199	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24 1:17.34 2:53.27	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger P Hutinger J Kurtzman B Greenberg	1990 1990 1990 1991 1992 1992 1990 1993 1990 1991	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18 1:27.91	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48 1:27.85 3:15.28	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks J Kurtzman J Kurtzman	1987 1983 1987 1983 1993 1992 1989 1992 1992 1991	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90 :33.34
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks R Franks J Kurtzman J Kurtzman T Haartz	1987 1987 1987 1991 1993 1993 1993 1993 1993 1991 1991	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24 1:17.34 2:53.27 :29.42	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger P Hutinger J Kurtzman B Greenberg B Greenberg	1990 1990 1990 1991 1992 1992 1990 1993 1990 1991 1989	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18 1:27.91 3:20.02	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48 1:27.85 3:15.28 :33.63	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks J Kurtzman J Kurtzman B Greenberg	1987 1983 1987 1983 1993 1992 1989 1992 1991 1991 1991 1991	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:24.00 :33.39 1:20.59	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90 :33.34 1:20.59
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 free	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks J Kurtzman J Kurtzman J Hartz F Piemme	1987 1987 1987 1991 1993 1993 1993 1993 1991 1991	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24 1:17.34 2:53.27 :29.42 1:09.77	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger P Hutinger J Kurtzman B Greenberg F Greenberg F Piemme	1990 1990 1990 1991 1992 1992 1990 1993 1990 1991 1989 1989	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18 1:27.91 3:20.02 :33.63	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48 1:27.85 3:15.28 :39.63 1:21.66	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks J Kurtzman J Kurtzman B Greenberg F Piemme	1987 1983 1987 1983 1993 1992 1989 1992 1992 1991 1991 1991	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:24.00 :33.39	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90 :33.34
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 free 50 free	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks R Franks J Kurtzman J Kurtzman J Haartz F Piemme J Kutzman	1987 1987 1987 1991 1993 1993 1993 1993 1991 1991 199	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 1:10.07 2:30.53 :33.24 1:17.34 2:53.27 :29.42 1:09.77 2:41.99	F Piemme F Piemme E Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger P Hutinger J Kurtzman B Greenberg B Greenberg F Piemme J Kurtzman	1990 1990 1990 1991 1992 1992 1993 1990 1991 1989 1989 1989	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18 1:27.91 3:20.02 :33.63 1:21.66	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48 1:27.85 3:15.28 :39.63 1:21.66	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks J Kurtzman J Kurtzman B Greemberg F Piemme J Kurtzman	1987 1983 1987 1983 1993 1992 1989 1992 1991 1991 1991 1991	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:24.00 :33.39 1:20.59	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90 :33.34 1:20.59 3:08.79
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks J Kurtzman J Kurtzman T Haartz F Piemme J Kurtzman C Moss	1987 1987 1987 1991 1993 1993 1993 1993 1991 1991 199	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24 1:17.34 2:53.27 :29.42 1:09.79	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger J Kurtzman B Greenberg B Greenberg F Piemme J Kurtzman J Kurtzman J Kurtzman	1990 1990 1990 1991 1992 1992 1990 1993 1990 1991 1989 1989 1999 1991	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18 1:27.91 3:20.02 :33.63 1:21.66 3:10.49	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 :38.48 1:27.85 3:15.28 :33.63 1:21.66 3:13.03	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks J Kurtzman J Kurtzman B Greenberg F Piemme J Kurtzman J Kurtzman	1987 1983 1987 1983 1993 1992 1989 1992 1991 1991 1991 1991	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:24.00 :33.39 1:20.59	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90 :33.34 1:20.59 3:08.79 2:57.61
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	P Powlison P Powlison P Powlison P Powlison F Piemme R Franks R Franks P Hutinger R Franks J Kurtzman J Kurtzman T Haartz F Piemme J Kurtzman C Moss P Powlison	1987 1987 1987 1991 1993 1993 1993 1993 1991 1991 199	:25.62 :56.24 2:10.80 6:15.85 13:00.78 21:39.42 :31.26 1:10.07 2:30.53 :33.24 1:17.34 2:53.27 :29.42 1:09.77 2:41.99	F Piemme F Piemme F Piemme E Kerswill E Kerswill F Piemme P Hutinger P Hutinger J Kurtzman B Greenberg B Greenberg F Piemme J Kurtzman J Kurtzman J Kurtzman P Hutinger	1990 1990 1990 1991 1992 1992 1993 1990 1991 1989 1989 1990 1991 1991	:29.63 1:07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.54 1:19.68 2:54.25 :38.18 1:27.91 3:20.02 :33.63 1:21.64 1:19.90	:29.63 1.07.13 2:36.10 5:37.93 11:51.42 22:19.37 :35.61 1:19.68 2:55.83 3:15.28 :33.63 1:27.85 3:15.28 :31.303 1:19.90	P Powlison J Welch P Powlison J Welch F Piemme W Wilson G Gandsey R Franks R Franks J Kurtzman C Moss	1987 1983 1987 1983 1993 1992 1989 1992 1991 1991 1991 1991 1992	:29.17 1:08.15 2:32.90 5:38.79 11:51.06 22:29.32 :35.47 1:20.74 2:55.42 1:28.91 3:24.00 :33.39 1:20.59 3:08.79	:28.94 1:08.15 2:32.90 5:38.79 11:35.97 22:29.32 :35.47 1:20.74 2:55.46 :38.28 1:28.91 3:16.90 :33.34 1:20.59 3:08.79 2:57.61

MEN 70-74	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
50 free	K Lemmon	1982		R Hakomaki	1992	:32.11		K Lemmon	1984	:29.35	:29.35
100 free	K Lemmon	1984		J Richards	1992	1:12.57		K Lemmon	1983	1:11.61	1:11.61
200 free	K Lemmon	1982	2:24.72	R Taft	1989	2:46.86	2:46.86	K Lemmon	1983	2:44.86	2:44.86
400/500 free	F Taioli	1991	6:52.21	R Taft	1989	5:56.06	5;56.06	R Taft	1989	6:04.62	5:57.45
800/1000 free	F Taioli	1991	14:15.81	R Taft	1989	12:15.49	12:15.49	F Taioli	1991	12:36.65	12:34.22
1500/1650 free	A Da Rosa	1988	23:44.48	A Da Rosa	1988	23:59.12	23:59.12	F Taiolı	1991	24:28.27	23:59.01
50 back	R Taft	1993	:34.13	R Taft	1989	:38.44	:36.97	R Taft	1989	:37.49	:37.49
100 back	J Dilley	1991	1:15.70	R Taft	1989	1:24.30	1:24.30	R Taft	1989	1:25.35	1:25.35
200 back	R Taft	1993	2:50.06	R Taft	1989	3:07.57	3:07.57	R Taft	1989	3:13.25	3:13.25
50 breast	P Krup	1989	:36.17	P Krup	1989	:40.81	:40.02	B Allen	1984	:41.44	:40.56
100 breast	A Da Rosa	1988	1:21.03	A Da Rosa	1988	1:32,13	1:32.13	B Allen	1984	1:33.20	1:33.20
200 breast	A Da Rosa	1988	3:03.29	A Da Rosa	1988	3:24.66	3:24.66	A Da Rosa	1988	3:32.90	3:32.90
50 fly	B Davidson	1989	:31.95	A Holden	1990	:36.09	:35.35	R Taft	1989	:35.65	:35.65
100 fly	A Holden	1990	1:18.88	P Krup	1989	1:31.20	1:27.28	A Holden	1990	1:32.85	1:32.85
200 fly	A Cerer	1987	2:58.78	A Cerer	1989	3:31.97	3:31.97	A Holden	1990	3:39.04	3:38.48
100 IM	R Taft	1989	1:13.66	R Taft	1989	1;21.87	1:21.87				
200 IM	B Davidson	1989	2:47.68	R Taft	1989	3:08.13	3:08.13	R Taft	1989	3:11.42	3:11.42
400 IM	B Davidson	1989	6:14.18	R Taft	1989	6:50.27	6:50.27	R Taft	1989	6:59.24	6:59.24
	•		•					•			
MEN 75-79	SC-Yards	Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	K Lemmon	1987	:28.73	K Lemmon	1988	:32.78	:32.78	L Collet	1983	:32.50	:32.50
	K Lemmon K Lemmon	1987 1988	:28.73 1:04.28	K Lemmon K Lemmon	1988 1988	:32.78 1:15.94	:32.78 1:15.94	L Collet K Lemmon	1983 1987	:32.50 1:14.86	:32.50 1:14.86
50 free	K Lemmon	1987	:28.73 1:04.28 2:30.58	K Lemmon K Lemmon K Lemmon	1988	:32.78 1:15.94 2:55.63	:32.78 1:15.94 2:59.20	L Collet K Lemmon K Lemmon	1983 1987 1987	:32.50 1:14.86 2:53.73	:32.50 1:14.86 2:53.73
50 free 100 free	K Lemmon K Lemmon	1987 1988	:28.73 1:04.28 2:30.58 7:12.60	K Lemmon K Lemmon K Lemmon D Woodford	1988 1988 1988 1989	:32.78 1:15.94 2:55.63 6:23.81	:32.78 1:15.94 2:59.20 6:23.81	L Collet K Lemmon K Lemmon A Rule	1983 1987 1987 1981	:32.50 1:14.86 2:53.73 6:27.76	:32.50 1:14.86 2:53.73 6:27.76
50 free 100 free 200 free	K Lemmon K Lemmon K Lemmon	1987 1988 1988 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47	K Lemmon K Lemmon K Lemmon D Woodford D Woodford	1988 1988 1988 1989	:32.78 1:15.94 2:55.63 6:23.81	:32.78 1:15.94 2:59.20	L Collet K Lemmon K Lemmon A Rule	1983 1987 1987 1981 1987	:32.50 1:14.86 2:53.73 6:27.76 13:35.96	:32.50 1:14.86 2:53.73 6:27.76 13:35.96
50 free 100 free 200 free 400/500 free	K Lemmon K Lemmon K Lemmon A Da Rosa	1987 1988 1988 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47	K Lemmon K Lemmon K Lemmon D Woodford	1988 1988 1988 1989 1989	:32.78 1:15.94 2:55.63 6:23.81 13:17.26	:32.78 1:15.94 2:59.20 6:23.81	L Collet K Lemmon K Lemmon A Rule H Howe	1983 1987 1987 1981 1987	:32.50 1:14.86 2:53.73 6:27.76	:32.50 1:14.86 2:53.73 6:27.76 13:35.96
50 free 100 free 200 free 400/500 free 800/1000 free	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa	1987 1988 1988 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25	K Lemmon K Lemmon K Lemmon D Woodford D Woodford	1988 1988 1988 1989 1989	:32.78 1:15.94 2:55.63 6:23.81 13:17.26	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05	L Collet K Lemmon K Lemmon A Rule H Howe	1983 1987 1987 1981 1987 1987	;32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 ;40.47	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa	1987 1988 1988 1993 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea	1988 1988 1988 1989 1989	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90	L Collet K Lemmon K Lemmon A Rule H Howe H Howe	1983 1987 1987 1981 1987	;32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea	1987 1988 1988 1993 1993 1993 1991	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke	1988 1988 1988 1989 1989 1989	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave	1983 1987 1987 1981 1987 1987	;32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 ;40.47	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe	1987 1988 1988 1993 1993 1993 1991 1992	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke	1988 1988 1988 1989 1989 1989 1992	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave	1983 1987 1987 1981 1987 1987 1982 1982	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea	1987 1988 1988 1993 1993 1993 1991 1992 1992	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea	1988 1988 1988 1989 1989 1989 1992 1993	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave E Shea	1983 1987 1987 1981 1987 1987 1982 1982	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup	1987 1988 1988 1993 1993 1993 1991 1992 1992	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59 1:25.80	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea P Krup	1988 1988 1988 1989 1989 1989 1992 1993 1991	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82 :42.85	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82 :42.85 1:37.39	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave E Shea B Allen	1983 1987 1987 1981 1987 1987 1982 1982 1991	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :43.61	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup A Da Rosa	1987 1988 1988 1993 1993 1993 1991 1992 1992 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59 1:25.80 3:13.37	K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea P Krup A Da Rosa	1988 1988 1988 1989 1989 1989 1992 1993 1991	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82 :42.85 1:37.39	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82 :42.85 1:37.39 3:36.71	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave E Shea B Allen A Da Rosa	1983 1987 1987 1981 1987 1987 1982 1982 1991 1989	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :43.61 1:39.62	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58 1:37.55
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast	K Lemmon K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup A Da Rosa A Da Rosa	1987 1988 1988 1993 1993 1993 1991 1992 1992 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59 1:25.80 3:13.37	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea P Krup A Da Rosa D McCullough P Krup	1988 1988 1988 1989 1989 1989 1992 1993 1991 1995 1992	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82 :42.85 1:37.39 3:36.71	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.24	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave E Shea B Allen A Da Rosa A Da Rosa	1983 1987 1987 1987 1987 1987 1982 1982 1991 1989 1993	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :43.61 1:39.62 3:43.59	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58 1:37.55 3:39.00
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup A Da Rosa K Lemmon	1987 1988 1988 1993 1993 1993 1991 1992 1992 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59 1:25.80 3:13.37 :35.44	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea P Krup A Da Rosa D McCullough P Krup P Krup	1988 1988 1988 1989 1989 1989 1992 1993 1991 1995 1992 1990	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.81	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.24 1:36.80	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave A Hargrave E Shea B Allen A Da Rosa K Lemmon	1983 1987 1987 1981 1987 1987 1982 1982 1991 1989 1993 1993	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :43.61 1:39.62 3:43.59 :41.25	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58 1:37.55 3:39.00 :39.65
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup A Da Rosa A Da Rosa K Lemmon P Krup	1987 1988 1988 1993 1993 1993 1991 1992 1993 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59 1:25.80 3:13.37 :35.44 1:27.99 3:17.53	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea P Krup A Da Rosa D McCullough P Krup P Krup	1988 1988 1988 1989 1989 1989 1992 1993 1991 1993 1992 1993	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.81	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.24 1:36.80	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave E Shea B Allen A Da Rosa A Da Rosa K Lemmon A Cerer	1983 1987 1987 1981 1987 1987 1982 1982 1991 1989 1993 1993 1987	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :43.61 1:39.62 3:43.59 :41.25	:32.50 1:14.86 2:53,73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58 1:37.55 3:39.00 :39.65 1:39.80
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 100 free 50 fly 100 fly 200 fly 100 fly	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup A Da Rosa A Da Rosa K Lemmon P Krup A Cerer	1987 1988 1988 1993 1993 1993 1991 1992 1993 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.59 1:25.80 3:13.37 :35.44 1:27.93 1:16.57	K Lemmon K Lemmon K Lemmon D Woodford D Woodford D Woodford E Shea N Fluke E Shea P Krup A Da Rosa D McCullough P Krup P Krup P Krup P Krup	1988 1988 1988 1989 1989 1992 1993 1991 1995 1992 1993 1992	:32.78 1:15.94 2:55.63 6:23.81 136:04.74 4:41.93 1:34.08 3:27.82 42.85 1:37.39 3:36.71 40.81 1:36.80 3:49.00	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.24 1:36.80 1:32.84	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave E Shea B Allen A Da Rosa A Da Rosa K Lemmon A Cerer	1983 1987 1987 1981 1987 1987 1982 1982 1991 1989 1993 1993 1987	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :43.61 1:39.62 3:43.59 :41.25	:32.50 1:14.86 2:53,73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58 1:37.55 3:39.00 :39.65 1:39.80
50 free 100 free 200 free 400/500 free 800/1000 free 1500/1650 free 50 back 100 back 200 back 50 breast 100 breast 200 breast 50 fly 100 fly 200 fly	K Lemmon K Lemmon K Lemmon A Da Rosa A Da Rosa A Da Rosa E Shea A Vande Weghe E Shea P Krup A Da Rosa A Da Rosa K Lemmon P Krup A Cerer K Lemmon	1987 1988 1988 1993 1993 1993 1992 1992 1993 1993 1993	:28.73 1:04.28 2:30.58 7:12.60 14:37.47 24:48.25 :37.10 1:21.83 3:02.98 :37.59 1:25.89 3:13.37 :35.44 1:27.99 3:17.53 1:16.57	K Lemmon K Lemmon K Lemmon D Woodford D Woodford E Shea N Fluke E Shea P Krup A Da Rosa D McCullough P Krup P Krup A Da Rosa	1988 1988 1988 1989 1989 1992 1993 1991 1992 1990 1993 1992 1992	:32.78 1:15.94 2:55.63 6:23.81 13:17.26 26:04.74 :41.93 1:34.08 3:27.82 :42.85 1:37.39 3:36.71 :40.81 1:36.80 1:32.84	:32.78 1:15.94 2:59.20 6:23.81 13:17.26 25:15.05 :41.90 3:27.82 :42.85 1:37.39 3:36.71 :40.24 1:36.80 3:49.00 1:32.84	L Collet K Lemmon K Lemmon A Rule H Howe H Howe A Hargrave E Shea B Allen A Da Rosa A Da Rosa K Lemmon A Cerer	1983 1987 1987 1987 1987 1987 1982 1993 1993 1993 1993 1993 1992	:32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 1:39.62 3:43.59 :41.25 1:39.80 3:43.56	32.50 1:14.86 2:53.73 6:27.76 13:35.96 25:41.55 :40.47 1:32.92 3:25.93 :42.58 1:37.55 3:39.00 :39.65 1:39.80 3:43.56

MEN 80-84	SC-Yards	Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	K Lemmon	1992		G Sobel	1991	:37.85		W Bowersock	1993	:33.88	:34.00
100 free	G Sobel	1990	1:17.82	G Sobel	1991	1:27.87	3035 (OUNTED)	W Bowersock	1993	1:22.50	1:23.56
200 free	K Lemmon	1992	2:49.94	G Sobel	1991	3:22.37	3:22.37	G Langner	1983	3:31.79	3:31.79
400/500 free	G Langner	1985	8:03.55	H Howe	1992	7:30.51	7:05.20	G Langner	1983	7:23.09	7:23.09
800/1000 free	G Langner	1985	16:54.23	H Howe	1992	15:07.97	15:07.97	G Langner	1985	15:53.13	15:48.62
1500/1650 free	G Langner	1985	28:04.21	G Langner	1986	29:58.32	29:58.32	G Langner	1983	28:54.95	28:54.95
50 back	D Malbrough	1993	:41.05	H Eisenschmidt	1987	:50.13	:45.93	A Hargrave	1987	:45.69	:45.69
100 back	D Malbrough	1993	1:33.96	H Eisenschmidt	1987	1:50.89	1:44.14	D Malbrough	1993	1:45.81	1:45.37
200 back	D Malbrough	1993	3:34.08	H Eisenschmidt	1987	4:01.12	4:01.12	C Salie	1992	3:58.25	3:47,46
50 breast	K Lemmon	1992		J Penfield	1989	:55.32	:45.52	B Shott	1990	:49.49	:46.59
100 breast	K Lemmon	1992	1:32.72	J Penfield	1989	2:09.01	2:04.00	K Lemmon	1993	1:56.31	1:51.25
200 breast	A Kallunki	1984	4:03.66	W Share	1989	5:03.34	4:42.90	H Perry	1992	4:25.69	4:25.69
50 fly	J Coon	1990	:40.94	J Coon	1991	:49.08	:49.08	J Coon	1991	:52.05	:52.05
100 fly	J Coon	1991	1:50.88	J Coon	1991	2:07.29	2:07.29	J Coon	1991	2:21.06	2:21.06
200 fly	J Coon	1990	4:20.25	J Coon	1991	5:14.66	5:14.66	J Coon	1992	5:36.65	5:11.48
100 IM	J Penfield	1988	1:40.18	H Eisenschmidt	1987	1:53.59	1:49.06				
200 IM	H Eisenschmidt	1987	3:48.22	H Eisenschmidt	1987	4:36.38	4:22.04	H Eisenschmidt	1987	4:22.70	4:20.05
400 IM	H Eisenschmidt	1989	8:27.54	H Eisenschmidt	1988	9:25.63	9:25.63	J Coon	1991	10:29.63	9:47.72
	Personal and Control of the Control		Separate Sep					To Section			
MEN 85-89	SC-Yards	Year	USMS	SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
50 free	C Ross	1985	:39.47	G Langner	1989	:44.61	:44.61	F Brasington	1993	:42.09	:41.53
100 free	G Langner	1990	1:27.45	G Langner	1989	1:41.46	1:41.46	G Langner	1988	1:43.03	1:43.03
200 free	G Langner	1990	3:17.83	G Langner	1989	3:48.20	3:48.20	G Langner	1988	3:48.91	3:48.91
400/500 free	G Langner	1990	9:00.31	G Langner	1988	7:54.24	7:54.24	G Langner	1988	8:14.50	8:14.50
800/1000 free	G Langner	1989	18:18.29	G Langner	1988	16:53.90	16:53.90	G Langner	1988	17:11,21	17:11.21
1500/1650 free	G Langner	1990	31:02.36	G Langner	1988	32:20.20	32:20.20	G Langner	1989	33:08.42	33:08.42
50 back	P Jurczyk	1990	:52.83	P Jurczyk	1990	:57.97	:56.86	J Penfield	1993	:58.07	:58.07
100 back	P Jurczyk	1990	1:54.21	P Jurczyk	1990	2:12.69	2:13.02	J Penfield	1993	2:07.06	2:07.06
200 back	J Penfield	1993	4:13.75	P Jurczyk	1990	4:55.62	5:21.96	J Penfield	1992	4:43.49	4:43.49
50 breast	J Penfield	1993	:52.09	G Langner	1988	1:05.82	1:01.61	A Kallunki	1989	1:01.47	:58.96
100 breast	J Penfield	1993	2:03.10	G Langner	1989	2:31.20	2:31.20	J Penfield	1993	2:23.06	2:18.92
200 breast	A Kallunki	1990	4:34.29	G Langner	1988	5:30.76	5:30.76	A Kallunki	1989	5:35.03	5:09.86
50 fly	A Kallunki	1990	:59.14	A Olanoff	1991	1:21.90	1:21.90	J Penfield	1993	1:04.95	:59.50
	H Eisenschmidt	1992	2:32.32					A Olanoff	1991	3:23.06	2:33.63
100 fly			- 1					l			5:24.28
100 fly 200 fly			- 1								
200 fly	A Kallunki	1990	2:00.04	H Eisenschmidt	1991	2:23.03	2:23.03				
	A Kallunki T Cureton	1990 1987		H Eisenschmidt H Eisenschmidt	1991 1991	2:23.03 5:02.31		J Penfield	1993	5:32.99	4:40.15

MEN 90-94	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
50 free	J Reiners	1992	:46.53	P Spangler	1989	1:14.28	:50.57	G Langner	1993	:49.51	:49.51
100 free	P Spangler	1989	2:24.60	P Spangler	1990	2:49.33	2:49.33	G Langner	1993	1:57.91	1:57.91
200 free	P Spangler	1990	5:22.61	P Spangler	1990	5:51.45	5:51.45	G Langner	1993	4:28.34	4:28.34
400/500 free	P Spangler	1989	13:13.36	P Spangler	1989	11:09.76	11:09.76	G Langner	1993	9:44.11	9:44.11
800/1000 free	P Spangler	1989	28:04.65	_				G Langner	1993	23:15.77	23:15.77
1500/1650 free	P Spangler	1989	51:31.39	P Spangler	1990	51:43.20	51:43.20	G Langner	1993	36:47.02	36:47.02
50 back	TLane	1989	1:15.02	T Lane	1989	1:29.99	1:29.99	TLane	1989	1:16.30	1:16.30
100 back	T Lopez	1990	3:17.90				3:38.08	TLopez	1991	4:45.88	3:19.14
200 back	T Lopez	1990	6:40.23					TLopez	1990	8:59.53	8:59.53
	J Reiners	1992	1:10.74	TLane	1989	1:50.16			1989	1:36.87	1:36.87
100 breast	TALL MANAGEMENT CALL		2000 1000 1	1				L Magener	1982		5:16.03
200 breast							ſ	•			
50 fly							- 1				
100 fly											
200 fly											
100 IM							1				
200 IM							J				
400 IM											
				la .							
	SC-Yards	Year		SC-Meters	Year	USMS		LC-Meters	Year	USMS	World
	TLane	1990	1:14.35					TLane	1989	1:20.52	
	T Lane	1990	3:20.38					TLane	1992	3:30.59	
200 free)				- {				
400/500 free											
800/1000 free											
1500/1650 free			Ï				- 1				
50 back	Tlane	1989	1:08.20					TLane	1989	1:18.91	
100 back	T Lane	1992	3:05.81					TLane	1992	3:19.14	
200 back							1				
50 breast	T Lane	1989	1:27.94					T Lane	1989	2:03.52	
100 breast											
200 breast	f.						1				
50 fly											
							1				
120 Marian 180											
100 fly 200 fly											
100 fly											
100 fly 200 fly											

MEN 100-104	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
50 free								E Thomas	1993	2:22.05	
100 free											
200 free											
400/500 free											
800/1000 free											
1500/1650 free											
50 back											
100 back											
200 back											
50 breast											
100 breast											
200 breast											
50 fly											
100 fly											
200 fly											
100 IM											
200 IM	1										
400 IM											

WOMEN'S RELAYS

	WOMEN 19+/76+	SC-Yards	Year		SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
7	200 free relay	Holmes Lumber	1992	1:38.68	Univ Houston	1988	1:59.79		U Of San Fran	1992	1:59.29	
2	00 med relay	Raleigh	1992	1:52.20	Pacific NW	1990	2:22.24		U Of San Fran	1992	2:12.59	
4	00 free relay	U Of San Fran	1993	3:46.29	Longhorn	1990	4:45.47	1	Sacramento	1992	4:32.12	
4	00 med relay	U Of San Fran	1992	4:10.11	Empire State	1991	5:07.60		Sacramento	1992	5:07.42	
8	00 free relay	U Of San Fran	1992	8:12.80	Space Coast	1987	10:55.74		Davis	1992	10:56.32	
	•	•			• •							
٧	VOMEN 25+/100+	SC-Yards	Year	USMS	ISC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
2	00 free relay	Lone Star	1989	1:37.40	Baylor/Lone Star	1993	1:54.04	1:54.54	Oregon	1992	1:52.47	1:53.20
2	00 med relay	Houstonian	1991	1:49.19	Arizona	1992	2:16.25	2:10.15	Holmes Lumber	1988	2:06.67	2:06.67
4	00 free relay	Walnut Creek	1991	3:37.75	O*h*i*o	1992	4:34.09		Davis	1992	4:27.84	
4	00 med relay	U Of San Fran	1992	4:09.85	St. Louis	1987	4:58.83		Walnut Creek	1992	4:55.59	
	00 free relay	Walnut Creek	1991		Air Force	1991	9:48.14		Walnut Creek	1989	9:50.91	
	•				· · · · · · · · · · · · · · · · · · ·							
٧	VOMEN 35+/120+	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
2	00 free relay	New England	1992	1:43.16	St Louis	1989	1:58.02	1:55.08	Lone Star	1987	1:53.05	1:53.05
2	00 med relay	S Cal	1993	1:57.52	St Louis	1989	2:13.77	2:10.84	D C Masters	1987	2:11.61	2:08.21
4	00 free relay	Los Altos	1989	4:06.91	San Diego	1989	4:25.46		San Diego	1989	4:26.76	
	00 med relay	Los Altos	1990		Empire State	1992	4:53.87		Walnut Creek	1991	5:00.94	
	00 free relay	Los Altos	1990		O*h*i*o	1992	9:48.06		San Diego	1990	9:48.97	
~		1200 1		0.02	,		57.5155	,		,	21.5.57	
٧	VOMEN 45+/160+	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
2	00 free relay	Los Altos	1993	1:55.86	D C Masters	1989	2:01.10	2:01.10	D C Masters	1988	2:03.48	2:03.48
2	00 med relay	D C Masters	1991	2:12.67	D C Masters	1989	2:19.83	2:18.65	Rocky Mountain	1992	2:15.86	2:15.86
	00 free relay	D C Masters	1993	4:21.71	San Diego	1993	4:40.73		San Ďiego	1993	4:37.01	
	00 med relay	D C Masters	1993	5:08.96	Escondido	1990	6:57.48		San Diego	1989	5:24.49	
		D C Masters	1993		San Diego	1993	10:10.40		San Diego	1991	10:33.64	
_	,	, ···········		• • • • • • • • • • • • • • • • • • • •	1			•	· · · · · · · · · · · · · · · · ·			
٧	VOMEN 55+/200+	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
2	00 free relay	New England	1991	2:14.01	Tamalpais	1989	2:11.64	2:11.64	Los Altos	1992	2:09.35	2.09.35
2	00 med relay	Walnut Creek	1993		Tamalpais	1989	2:34.15	2:29.96	Los Altos	1992	2:28.26	2:27.18
4	00 free relay	Walnut Creek	1993	5:23.15	San Diego	1990	6:06.07		San Diego	1990	5:27.04	
	00 med relay	Rinconada	1988		San Diego	1990	6:16.07		D C Masters	1991	5:48.73	
	00 free relay	Walnut Creek	1991		San Diego	1990	12:44.99		San Diego	1990	11:58.26	
_		,	•		,							

WOMEN 65+/240+	SC Yards	Year	USMS	SC Meters	Year	USMS	World	LC Meters	Year	USMS	World
200 free relay	Santa Barbara	1989	2 24 64	St Louis	1992	2 46 95	2 42 57	New England	1988	2 35 32	2 28 24
200 med relay	Santa Barbara	1989	2 55 36	St Louis	1992	2 52 00	2 52 00	St Louis	1993	2 51 91	2 51 82
400 free relay	Santa Barbara	1989	5 32 88	St Louis	1992	6 09 03		Walnut Creek	1992	6 15 17	
400 med relay	Santa Barbara	1989	6 47 55	St Louis	1992	6 24 68		Walnut Creek	1992	6 50 38	
800 free relay	Santa Barbara	1989	12 14 80	San Diego	1992	13 34 12		Walnut Creek	1992	13 28 86	
	•			_				•			
WOMEN 75+/280+	SC Yards	Year		SC Meters	Year	USMS		LC Meters	Year	USMS	World
200 free relay	Walnut Creek	1993	3 26 38	Holmes Lumber	1993	3 04 95	3 04 95	Walnut Creek	1993	3 15 26	3.09 01
200 med relay	Walnut Creek	1993	3 47 25	Holmes Lumber	1993	3 30 93	3 28 26	Walnut Creek	1993	3 38 67	3.35 00
400 free relay				San Mateo	1992	7 26 27		Walnut Creek	1989	8 01 05	
400 med relay	İ			San Mateo	1992	8 16 37		Walnut Creek	1993	8 32 38	
800 free relay	Walnut Creek	1993	17 31 22	St. Louis	1991	15 49 09		Walnut Creek	1992	16 17 09	
	•			•							
WOMEN 85+/320+	SC Yards	Year	USMS	SC Meters	Year	USMS	World	LC Meters	Year	USMS	World
200 free relay		***************************************									
200 med relay	į										
400 free relay											
400 med relay	•										
800 free relay	1										
· ·	•			•							

MENS RELAYS

MEN 19+/76+	SC Yards	Year	USMS SC Meters	Year	USMS	World LC-Meters	Year	USMS	World
200 free relay	S Cal	1993	1 26 15 Michigan	1992	1 43 64	Olympic Club	1993	1 41 14	
200 med relay	Texas Aquatics	1992	1 36 31 Michigan	1992	1 58 73	U of San Fran	1992	1 52 24	
400 free relay	Colonials	1993	3 15 05 Davis	1990	3 53 01	Empire	1992	4 11 98	
400 med relay	U Of San Fran	1992	3 34 08 Davis	1990	4 56 13	Empire	1992	4 40 23	
800 free relay	Stanford	1992	7 22 25 Space Coast	1987	11 48 18	Davis	1989	9 11 58	
MEN 25+/100+	ISC Yards	Year	USMSISC Meters	Year	USMS	World LC-Meters	Year	USMS	World
200 free relay	Houstonian	1990	1 23 34 Baylor/Lone Star	1993	1 36 15	1 35 91 Houstonian	1990	1 36 15	1:37 40
200 med relay	Lone Star	1991	1 31 54 Rosenberg	1988	1 52 59	1 48 16 Houstonian	1990	1 48 46	1 49 84
400 free relay	S Cal	1992	3 14 35 Longhorn	1990	3 55 59	Walnut Creek	1992	3 45 83	
400 med relay	U Of San Fran	1992	3 35 60 South Bay	1991	4 21 93	Santa Barbara	1988	4 18 93	
800 free relay	Long Beach	1993	7 06 78 South Bay	1991	8 32 67	Lynbrook	1989	8 36 26	

MEN 35+/120+	SC Yards	Year	USMS SC Meters	Year	USMS	World	LC Meters	Year	USMS	World
200 free relay	Lone Star	1990	1 25 72 Baylor/Lone Star	1992	1 37 89	1 37 89	Lone Star	1986	1 37 43	1.37 43
200 med relay	Colonials	1991	1 36 66 GCWP	1989	1 50 73	1 50 73	Baylor/Lone Star	1993	1 50 89	1 49 84
400 free relay	S Cal	1990	3 23 76 Davis	1990	3 55 05		Texas Swimaster	1989	3 50 76	
400 med relay	U Of Minn	1993	3 45 22 Berkeley	1992	4 23 91		Texas Swimaster	1989	4 20 98	
800 free relay	Minnesota	1992	7 37 33 Heartland	1991	8 41 77		Heartland	1992	8 48 95	
MEN 45+/160+	SC Yards	Year	USMS SC Meters	Year	USMS	World	LC Meters	Year	USMS	World
200 free relay	Tamalpais	1990	1 32 89 SWAM	1991	1 41 93	1 41 93	Holmes Lumber	1990	1 39 27	1:39 27
200 med relay	Olympic Club	1993	1 44 11 SWAM	1991	1 55 51	1 55 51	Olympic Club	1993	1 54 45	1 54 45
400 free relay	Oregon	1993	3 35 57 Lakeside	1992	4 00 88		Los Altos	1989	4 03 69	
400 med relay	Los Altos	1992	4 10 46 Oregon	1993	4 21 80		Caltech-PAC	1987	4 39 43	
800 free relay	Oregon	1993	8 01 37 Minnesota	1992	8 58 69		D C Masters	1987	9 12 20	
MEN 55+/200+	ISC-Yards	Year	USMSISC Meters	Year	USMS	World	ILC-Meters	Year	USMS	World
200 free relay	Olympic Club	1990	1 42.55 Los Altos	1989	1 48 34	1 48 34	Olympic Club	1992	1 47 65	1 47 65
200 med relay	S Cal	1987	1 57 74 Los Altos	1989	2 02 44		Olympic Club	1992	2 00 25	2.00 25
400 free relay	Walnut Creek	1991	4 17 34 Oregon	1991	4 30 16		Oregon	1992	4 28 75	
400 med relay	Walnut Creek	1991	4 55 98 Oregon	1991	5 11 59		Oregon	1992	5 01 24	
800 free relay	Walnut Creek	1992	9 41 77 Connecticut	1992	9 48 41		Oahu Club	1992	10 22 54	
MEN 65+/240+	ISC-Yards	Year	USMSISC Meters	Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	S Cal	1990	1 55 12 San Diego	1988	2 07 70	2 01 12		1992	1 58 54	1 58 54
200 med relay	S Cal	1993	2 09 02 Greater Indiana	1989	2 21 09	2 16 56	Lincoln	1991	2 21 20	2 21 20
400 free relay	S Cal	1990	4 28 95 S Cal	1989	4 51 11		Rinconada	1990	5 08 29	
400 med relay	Colonials	1992	5 18 61 S Cal	1990	5 46 32		Rinconada	1991	5 31 14	
800 free relay	S Cal	1993	10 40 71 San Diego	1993	12 03 13		San Mateo	1993	11 33 76	
MEN 75+/280+	ISC-Yards	Year	USMSISC Meters	Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	D C Masters	1991	2 24 77 Oregon	1990	2 13 84	2 11 80	Los Altos	1992	2 10 75	21018
200 med relay	Holmes Lumber	1991	2 50 76 Oregon	1990	2 36 92	2 33 74	Oregon	1992	2 34 57	2:34 57
400 free relay	St. Pete	1991	6 02 78 Oregon	1991	5 27 45		Oregon	1993	5 41 34	
400 med relay	St. Pete	1991	6 55 99 Oregon	1991	6 25 20		Colonials	1990	6 30 60	
800 free relay	St. Pete	1990	13 46 24 Oregon	1993	13 40 53		Oregon	1992	12 49 88	

MEN 85+/320+	SC-Yards	Year	USMS SC-Meters	Year	USMS	World LC-Meters	Year	USMS	World
200 free relay						3:14.13 Long Beach	1992	2:59.65	2:53.29
200 med relay			1			3:44.22 Long Beach	1992	3:58.14	3:30.60
400 free relay			ļ			1			
400 med relay			1			j			
800 free relay	1		1			1			

MIXED RELAYS

	laa.u				.,				.,		*** * * *
MIXED 19+/76+	SC-Yards	Year		SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	Long Beach	1993		Ancient Mariner	1993	1:51.87		U of San Fran	1992	1:48.50	
200 med relay	H2ouston	1992		Ancient Mariner	1993	2:03.76		U of San Fran	1992	2:02.31	
400 free relay	U Of San Fran	1992		Connecticut	1992	4:25.28		Davis	1993	4:22.10	
400 med relay	U Of San Fran	1991	3:58.70	Inland Empire	1987	5:26.32		U of San Fran	1991	4:36.72	
800 free relay	Davis	1992	7:48.42	Davis	1992	9:17.27		Santa Cruz	1989	10:05.52	
	•		•					•			
MIXED 25+/100+	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	S Cal	1990	1:29.40	Alaska	1989	1:47.91	1:46.19	Holmes Lumber	1988	1:45.58	1:43.89
200 med relay	Lone Star	1991	1:39.01	Air Force	1991	2:01.83	1:58.28	Houstonian	1990	1:56.50	1:56.58
400 free relay	U Of San Fran	1992	3:27.39	Davis	1992	4:16.92		Walnut Creek	1993	4:07.44	
400 med relay	Walnut Creek	1991	3:51.18	Air Force	1990	4:48.01		Walnut Creek	1990	4:36.14	
800 free relay	Walnut Creek	1991	7:41.32	Arizona	1992	9:03.17		Santa Cruz	1989	9:17.66	
•	•		•					•			
MIXED 35+/120+	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	Lone Star	1991	1:34.75	Texas	1989	1:48.60	1:48.60	Lone Star	1987	1:44.84	1:44.83
200 med relay	S Cal	1992	1:44.23	Lakeside	1989	1:58.28	1:58.28	D C Masters	1985	1:58.03	1:58.03
400 free relay	Los Altos	1990	3:40.82	S Cal	1989	4:05.98		Walnut Creek	1991	4:01.94	
400 med relay	Empire State	1993	4:07.14	Texas Swimaster	1988	4:56.95		Heartland	1993	4:35.74	
800 free relay	Los Altos	1993	8:07.69	San Diego	1989	9:12.88		Heartland	1993	9:10.24	
,			•	J							
MIXED 45+/160+	SC-Yards	Year	USMS	SC-Meters	Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	Tamalpais	1990	1:41.83	Greater Indiana	1989	1:50.55	1:50.55	Rocky Mountain	1992	1:47.46	1:47.46
200 med relay	Tamalpais	1992	1:54.80	Greater Indiana	1989	2:07.18	2:07.34	St. Petersburg	1992	2:02.86	2:02.10
400 free relay	Los Altos	1993	3:57.80	Los Altos	1988	4:29.69		San Diego	1991	4:26.33	
400 med relay	Tamalpais	1993	4:23.96	Connecticut	1992	4:50.99		San Diego	1991	4:55.94	
800 free relay	Los Altos	1992	9:09.04		1991	9:32.22		San Diego	1991	9:32.88	
	1		,],								

MIXED 55+/200+	SC-Yards	Year	USMS	SC-Meters		Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	S Cal	1987	1:56.25	Lincoln		1989	1:57.25	1.57 25	Los Altos	1992	1:58.15	1:58.15
200 med relay	D C Masters	1992	2:10.35	Lincoln		1989	2:15.20	2 12.50	Los Altos	1992	2:14.58	2:14.58
400 free relay	New England	1987	4:34.21	Oregon		1990	4:50.94		Lincoln	1990	4:56.69	
400 med relay	Walnut Creek	1991	5:17.37	San Diego		1991	5:13.60		D C Masters	1993	5:18.22	
800 free relay	Walnut Creek	1993	10:27.41	San Diego		1989	10:40.03		San Diego	1993	10:55.90	
-	•			_					•			
MIXED 65+/240+	SC-Yards	Year	USMS	SC-Meters		Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	Los Altos	1993	2.07.24	Los Altos	VIII.	1992	2:12.98	2:12.98	Los Altos	1992	2:10.74	2:09.67
200 med relay	Los Altos	1993	2:26.68	Los Altos		1991	2:32.46	2:32.46	New England	1988	2:29.30	2:29.30
400 free relay	Connecticut	1987	5:15.84	Tamalpais		1988	5:55.13		Oregon	1989	5:28.68	
400 med relay	Colonials	1993	5:50.65	St Louis		1992	5:59.74		Walnut Creek	1992	6:07.19	
800 free relay	Los Altos	1993	11:24.83	St Louis		1992	12:38.59		Los Altos	1989	12:21.32	
	•								•			
MIXED 75+/280+	SC-Yards	Year	USMS	SC-Meters		Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay	Rinconada	1987	2:44.49	Connecticut		1988	2:38.80	2:38.80	Oregon	1992	2:31.29	2:31.29
200 med relay	D C Masters	1992	3;11.96	Connecticut		1992	3:06.67	3:04.69	O*h*i*o	1993	2:56.33	2:37.98
400 free relay	Walnut Creek	1992	7:04.46	San Mateo		1989	6:26.07		San Mateo	1989	6:08.62	
400 med relay	Rinconada	1991	9:27.58	Connecticut		1988	7:42.99		Rinconada	1992	7:18.33	
800 free relay	San Mateo	1993	14:16.33	Space Coast		1987	20:36.33		San Mateo	1989	14:26.78	
	•		•									
MIXED 85+/320+	SC-Yards	Year	USMS	SC-Meters		Year	USMS	World	LC-Meters	Year	USMS	World
200 free relay				San Mateo		1992	3:48.82	3:48.82	D C Masters	1993	3:03.15	3:03.15
200 med relay				San Mateo		1991	4:23.02	4:23.02	D C Masters	1993	4:25.47	4:18.03
400 free relay												
400 med relay				San Mateo	4	1992	10:40.94		D C Masters	1993	8:52.61	
800 free relay												
•	•		•						•			

Page 114 LONG DISTANCE RECORDS

Long Distance Records

19 24	Women	Year	Record	Men	Year	Record
1 hour postal	L Peckenham	1992	5225Y	R Schmidt	1988	5625Y
6000Y postal	K Fisher	1992	1 14 03 40			
10K postal	S B Brownstein	1988	2 25 23 15	S Cohen	1993	2 11 58 09
1 mile cable	K Bryan	1983	23 25 46	J Barber	1983	21 20 86
2 mile cable	S Leupold	1993	43 47 65	G Houck	1990	42 49 00
•			•			
25 29	Women	Year	Record	Men	Year	Record
1 hour postal	W Cuckovich	1990	5415Y	D Veatch	1993	5975Y
6000Y postal	M Cleveland	1992	1 15 41 27	M Collins	1992	1 14 57 99
10K postal	S Blaha	1985	2 22 40 00	M Volk	1989	2 04 50 00
1 mile cable	S Swayman	1981	21 46 43	D Winant	1981	20 50 81
2 mile cable	D Cain	1984	42 10 30	J Pearson	1992	39 36 39
30 34	Women	Year	Record	Men	Year	Record
1 hour postal	P Mattson	1988	5295Y	B Placek	1990	5750Y
6000Y postal	L Henshaw	1992	1 13 37 99	J Matysek	1991	1 12 14 15
10K postal	P Mattson	1985	2 17 19 08	B Patten	1993	2 03 08 74
1 mile cable	S Thomas	1984	21 27 07	M Bernadino	1983	21 26 82
2 mile cable	S Thomas	1984	43 34 56	J Kegley	1988	38 32 00
35 39	Women	Year	Record	Men	Year	Record
1 hour postal	P Mattson	1989	5165Y	S MacDonald	1992	5565Y
6000Y postal	V Enneking	1992	1 23 19 99	S MacDonald	1992	1 04 47 99
10K postal	P Mattson	1988	2 16 22 59	J McConica	1988	2 07 09 01
1 mile cable	M Stevens	1988	23 04 20	R Walton	1988	21 23 33
2 mile cable	S Skiff	1992	46 00 13	R Phillips	1990	43 02 00
	•		_			
40 44	Women	Year	Record	Men	Year	Record
1 hour postal	B Dunbar	1990	5030Y	K Polansky	1992	5450Y
6000Y postal	K Watson	1991	1 45 23 45	S Craven	1991	1 14 40 29
10K postal	D Ogier Pollard	1992	2 27 47 39	K Bell	1989	2 17 40 29
1 mile cable	J Katz	1986	23 50 52	J Cooke	1988	22 37 24
2 mile cable	B Dunbar	1990	43 06 00	K Bell	1989	44 30 00
•			•			
45 49	Women	Year	Record	Men	Year	Record
1 hour postal	J Royer	1987	4490Y	H Winn	1989	5195Y
6000Y postal	A Greenhaw	1991	1 37 25 95	P Lofthouse	1992	1 16 05 99
10K postal	L Weir	1986	2 47 07 36	K Bell	1993	2 18 54 83
1 mile cable	B Zaremski	1986	28 24 67	M Goldstein	1984	23 47 75
2 mile cable	H Buss	1984	48 08 20	J Cooke	1992	47 12 09
	•			•		
50 54	Women	Year	Record		Year	Record
1 hour postal	L Stornoff	1983	4400Y	H Winn	1992	5075Y
6000Y postal	M Anderson	1992	1 27 08 99	B Coale	1992	1 21 00 56
10K postal	H Buss	1990	2 47 12 49	S Thrasher	1993	2 28 24 08
1 mile cable	A Rockefeller	1984	31 21 91	S Kooistra	1978	23 11 86
2 mile cable	B Jordan	1991	55 10 00	T Harasztı	1991	45 28 00

55-59	Women	Year	Record	Men	Year	Record
1 hour postal	L Stoinoff	1988	4415Y	B Sturtvant	1989	4675Y
6000Y postal	J Little	1992	1 41 05 99	T Hetzel	1992	1 53 39 99
10K postal	C Anderson	1992	3 12-13 99	C LeBourgeois	1993	2 39 52 59
1 mile cable	B Russ	1986	30 06 41	J Schmidt	1978	26 59 84
2 mile cable	J Lamott	1991	57 41 00	C Lebourgeus	1992	48 21 63
•			•			
60 64	Women	Year	Record	Men	Year	Record
1 hour postal	L Stoinoff	1993	4225Y	G Johnston	1993	4570Y
6000Y postal			1	S Schofield	1992	1 47 09 82
10K postal	R Manfredi	1986	3 58 01 00	F Reynolds	1993	2 56 11 90
1 mile cable	B Russ	1988	29 41 79	J Schmidt	1989	27 05 65
2 mile cable	B Russ	1990	1 01 11 00	W Phillips	1991	49 57 00
65-69	Women	Year	Record	Men	Year	Record
1 hour postal	C Walker	1993	4005Y	F Piemme	1991	4315Y
6000Y postal	L Nochman	1992	1 54 28 81	R Blake	1992	1 35 31 04
10K postal	L Nochman	1993	3 38 50 23	A Da Rosa	1985	2 58 08 83
1 mile cable	K Brazıl	1987	53 05 88	J Schull	1984	28 55 62
2 mile cable	B Russ	1992	1 05 46 19	J Alleva	1993	58 32 95
70 74	Women	Year	Record	Men	Year	Record
1 hour postal	M Meyer	1993	3360Y	A Da Rosa	1989	4080Y
6000Y postal	D.01	4000		G Clemens	1991	1 51 10 71
10K postal	R Steward	1988	4 54 25 78	H Howe	1984	2 57 58 03
1 mile cable	l Brown	19??	34 53 37	J Schull	1985	28 31 42
2 mile cable	I Brown	1986	1 13 53 70	F Murphy	1990	1 00 18 00
75-79	Women	Year	Record	Men	Year	Record
1 hour postal	J Dolce	1985	3115Y	A Da Rosa	1993	3865Y
6000Y postal	0 00100	1000	3,131	A Da Hosa	1550	30031
10K postal	I Brown	1990	4 19 19 99			
1 mile cable	E Landon	1979	49 11 96	J Irvine	1986	35 09 64
2 mile cable	E Bein	19??	1 55 52 27		1989	1 01 19 99
2						
80 84	Women	Year	Record	Men	Year	Record
1 hour postal	E Maurice	1985	2275Y	C Ross	1980	3435Y
6000Y postal						
10K postal						
1 mile cable						
2 mile cable				C Wood	1989	1 20 33 00
			•			
85-89	Women	Year	Record	Men	Year	Record
1 hour postal	E Kinney	1992	2150Y	C Ross	1985	3240Y
6000Y postal						
10K postal						
1 mile cable						
2 mile cable						

APPENDIX B

INFORMATION FOR MEET DIRECTORS AND OFFICIALS

PREPARATION OF MEET RESULTS

Meet results must include the name of the meet; the location of the meet (name of pool, city, and state); the date of the meet; the name and address of the meet director; the name and certification status of the officials (Referee, Starter, and stroke and turn judges); and the sanction or approval number.

The results of each event shall be published in the following order.

Individual events:

- 1. Print women's results first, then men's results.
- 2. Within each sex, print results by age group from youngest to oldest.
- Within each age group, print results in the following stroke orderfreestyle, backstroke, breaststroke, butterfly, and individual medley.
- 4. Within each stroke, print events in order from shortest to longest.

Relay events:

- Print women's relay results first, then men's relay results, then mixed relay results.
- Within each sex, print results in the following order: 200 freestyle relay, 200 medley relay, 400 freestyle relay, 400 medley relay, and 800 freestyle relay.
- Within each relay event, print results by age group from youngest to oldest.

Results, tapes, timing printouts, time cards, heat sheets, timers' heat sheets or swimmer lists, and other information used to compile results and records shall be kept for a minimum of one year after the conclusion of the meet.

DIFFERENCES BETWEEN USS AND USMS RULES

USMS follows Articles 101 and 102 of the U.S. Swimming Technical Rules with the following exceptions:

Starts, Strokes, and Relays

- Forward start. The forward start may be taken from the starting block, the pool deck, or a push from the wall. The Starter shall direct the swimmers to assume a position with at least one foot at the front of the block, the edge of the deck, or on the wall before the command, "Take your mark." Those starting in the water must have at least one hand in contact with the wall or starting block.
- * Backstroke start. For short course yards events, the feet may be placed in any position on the wall or on the gutter of the pool, and the swimmer may assume any desired starting position which does not remove either foot completely from the water, or either hand from the starting grips or pool edge. Standing in or on the gutter is not permitted at any time before the start. For short course meters and long course meters events, USMS and USS follow the same rules.
- * Backstroke. Standing in or on the gutter (any course) and curling the toes over the lip of the gutter (short course meters and long course meters) is not permitted after the start.
- * Butterfly. The breaststroke or whip kick may be used exclusively or interchangeably with the dolphin kick at any time during the race. However, when the breaststroke or whip kick is used, the arms must be recovered over the top of the water at least once per breaststroke kick, except after the last such kick before the turn or finish.
- * Relays. Relay swimmers who cannot exit the water quickly enough to prevent interference with automatic officiating equipment may be allowed to hold on to the lane line until all relays have finished, allowing them to exit the pool more slowly or via the ladders at the conclusion of the race.

Swimming Competition

- * Officials. The minimum number of officials at USMS sanctioned or approved Masters Swimming meets shall include the following:
 - 1 Referee
 - 1 Starter
 - 2 Stroke and Turn Judges
 - 2 Timers per lane (if automatic timing is not being used)

The Referee and Starter may double as stroke and turn judges, but the Referee and Starter may not be the same person. One of the officials shall be a Referee, Starter, or stroke and turn judge certified by USS, YMCA, or any other USMS-approved certifying body.

Page 118 APPENDIX B

- * Warm-up. If there is no other warm-up/warm-down area available in pools of five lanes or more, one lane shall be set aside for warm-up/warm-down during the conduct of the meet. If there is no other warm-up/warm-down area available in pools of four or fewer lanes, swimmers shall be allowed to swim to the other end of the pool at the end of each heat and a warm-up/warm-down period must be offered at least once during each half-hour of competition.
- * Timed Finals. All Masters events shall be conducted on a timed final basis.
- * Seeding. Age groups, sexes, and events of the same distance 200 yards or longer may be combined so that no swimmer has to swim alone and lanes may be filled.

It is recommended that when swimmers are seeded by time and not by age groups, the fastest two swimmers in each age group shall not be seeded into outside lanes. It is recommended that they be moved inward one lane, or given the center lane in the next slowest heat, whichever is the most appropriate placement.

Seeding at meets other than National Championship Meets may be either fast-to-slow or slow-to-fast. Seeding may differ for sprint and distance events. The meet announcement shall state the seeding for all events.

At the discretion of the meet director, competitors in the freestyle events over 200 meters may be required to swim two-to-a-lane when only one course is available for the event. When events are swum two-to-a-lane, obstructing another swimmer by swimming across the lane or otherwise interfering with the other swimmer may disqualify the offender, and the offender shall immediately be removed from the lane.

* Records. USMS records may only be established by USMS-registered swimmers in sanctioned or approved competition. Because swimmers from different age groups and sexes may compete in the same heat or event, a swimmer is not required to win his heat or event to establish a record.

Relay lead-off split times will not be considered for records or top ten times.

Required documentation for USMS records includes the Referee's signature, as well as the tape from the automatic or semi-automatic (with three buttons) timing equipment, or the time card bearing times and signatures from *three* timers.

- Scratch Procedures. Any swimmer or relay team not reporting for or competing in an event shall not be penalized.
- * Eligibility. The eligibility of a participant for a particular age group will be determined by age as of the *last* day of the meet.

Long Distance Swimming

* Costume. Multiple swim caps and neoprene caps are allowed in any USMS long distance competition. Separate wetsuit divisions may be offered in non-National Championship events.

USMS and World Record Applications

Documentation Requirements for USMS Records

- Completed "Application for USMS and/or World Record."
- * Copy of the tape from the electronic timing device bearing the signature of the meet referee <u>and/or</u> the time card bearing the times from three stopwatches, the signature of each timer, and the signature of the meet referee.

Documentation Requirements for World Records:

- * All documentation required for USMS Records.
- Proof-of-age consisting of a copy of the swimmer's birth certificate or passport (this is a one-time requirement for each swimmer).
- Completed "Pool Length Certification Form" (this is a one-time requirement for each pool).
- * The record application must be received within six months following the date of the performance.

Documentation Requirements for USMS Long Distance Records:

- Completed "Application for USMS Long Distance Record."
- Proof of achieved time or distance swum.
- * For postal events, a lap-count check-off sheet listing all split times and bearing the signature, name, address, and phone number of the lap counter/timer.
- * For cable swims, the technique used to measure the course and the signature, name, address, and phone number of the person who measured the course.

Page 120 APPENDIX B

APPLICATION FOR USMS AND/OR WORLD RECORD

1.	Distance		4. Offi	cial Time	
	50-100-200-400-500-800-1000-1500				mins secs hundredths
2.	Course SC-yards, SC-meters, LC-meters		5. Elec	ctronic timing	yesno
_					
3.	Stroke free, back, brst, fly, IM, FR, MR		6. Thr	ee stopwatch	esyesno
7.	Individual events:				
	Name	Gender	Birthdate	Age	USMS Number
8.	Relay team name				
	Names (in order of competing)	Gender	Birthdate	Age	USMS Number
9.	Pool name		City		State
	Last day of meet	Sa	anction#	LM	sc
	(Required only for World Records)				
11.	Is pool length certification on file with (Required only for World Records)	ı the USMS	Records Chair	man? _	yesno
11. 12.	(Required only for World Records) Record application submitted by:			_	
	(Required only for World Records)			_	
	(Required only for World Records) Record application submitted by:	***************************************	PI	none	
	(Required only for World Records) Record application submitted by: Name		Pł	none	
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name Address City tructions: Complete the above form in it.	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip
12.	(Required only for World Records) Record application submitted by: Name	s entirety. U	StateSet this space for so of all three times.	or attaching the	ip

POOL LENGTH CERTIFICATION FORM

1.	Pool name			LMSC			
	Address						
	City				State		Zip
2.	Measurement para	meters (circle	answer)				
	Pool length in meter	s:			25	50	
	Moveable bulkhead:	;			Yes	No	
	Measuring tape:				Steel	Fiberg	lass
	Number of touchpac	ds at time of m	easurement.		None	One	Two
3.	Measurements						
	Outside lane	feet	inches	or	meters	cent	imeters
	Middle lane			or			
		feet	Inches	_	meters	cent	irneters
	Outside lane	feet	inches	or	meters	cent	limeters
4.	Measured by:			Subm	itted by:		
	Name	·		Name			
	Title			Title			
	Address			Addre	ss		
	City			Clty_			
	State	Zip		State_			Zip
	Date			Date			

Send completed form to:

Walter Reid P.O. Box 8800A Stellacoom, WA 98388

Measurement procedures:

- * Measurements must be conducted using a steel or fiberglass tape
- * The tape must be longer than the distance to be measured.
- * Measurements may be reported in either the English system (feet/inches) or the metric system (meters/centimeters)
- * Measurements must be conducted for each outside lane and one of the center lanes.
- * Measurements must be taken at water level from inside end wall to inside end wall.
- * Measurements may be conducted with or without touch pads in place
- * Permanent courses need only be measured and submitted once unless structural changes have occurred since original measurement.
- * Pools with a moveable bulkhead should be measured as a permanent course and benchmarked Before each session of competition and at the conclusion of the meet, a responsible person must confirm the pool length by checking the benchmark as a reference point
- * Tolerance levels for pool measurements have not yet been established.

Page 122 APPENDIX B

APPLICATION FOR USMS LONG DISTANCE RECORD

1.	1-hour, 10K, or 6000Y postal; 1-mile or 2-		4.	Official	Time	eurs mins secs hundredths	
	• • • •	mile cable			-		
2.	25v, 25m, or 50m pool; 1/4-	mile cable	5.	Comple (if applica		ance_ specify yards or meters	
3.	Method of timing			(·· -/-/-	,	, ,	
••	electronic timing or three sto	pwatches					
6.	individual events:						
	Name	Gender	Birthda	te	Age	USMS Number	
7.	Relay team name		Age Group				
	Names (in order of competing)	Gender	Birthda	te	Age	USMS Number	
8.	Name of pool or body of water		City			State	
	Date of swim	nction#_	ction#LMSC				
9.	Lap counter/timer information (for postal swims only): Signature						
	Name				<u> </u>		
	Address						
	City					Zip	
10.	Course length certification (for open-w						
	Signature		************				
	Name		····	Phon	e		
	Address						
	City		Stat	e		Zip	
11.	Record application submitted by:						
	Name			Phon	e		
	Address						
	City		Stat	e		Zip	

Send the completed record application form and all required documentation to SALLY DILLON, P.O. Box 9499, Truckee, CA 96162.

APPENDIX C

NATIONAL & INTERNATIONAL MASTERS SWIMMING SCHEDULE

USMS NATIONAL CONVENTIONS

- 1994 USMS Convention, Kansas City, KS. September 28 October 2, 1994. Contact: Suzanne Rague, 935 N.W. 170th Place, Beaverton, OR 97006. Phone: (503)531-9051.
- 1995 USMS Convention, Houston, TX. September 20 24, 1995. Contact: Suzanne Rague, 935 N.W. 170th Place, Beaverton, OR 97006. Phone: (503)531-9051.

USMS NATIONAL CHAMPIONSHIP MEETS

- 1994 USMS Short Course Championships, Arizona State University, Tempe, Arizona. May 13-16, 1994. Contact: Tempe Rio Salado, P.O. Box 27523, Tempe, AZ 85285-7523. Voice mail: (602)902-0431.
- 1994 USMS Long Course Championships, Buffalo, New York. August 25-28, 1994. Contact: Gene Donner, c/o Southtown Business Forms, 4220 South Park Avenue, Blasdell, NY 14219. Phone: (716)823-3873, (716)823-8556 (fax).
- 1995 USMS Short Course Championships, International Swimming Hall of Fame, Fort Lauderdale, Florida. May 18-21, 1995. Contact: Stu Marvin, Hall of Fame Aquatic Complex, 501 Seabreeze Boulevard, Fort Lauderdale, FL 33316. Phone: (305)468-1580.
- 1995 USMS Long Course Championships, Gresham, Oregon. August 24-27, 1995. Contact: John Zell, 4640 N.E. 36th Avenue, Portland, OR 97211. Phone and fax: (503)282-9347 (after 7pm Pacific time).

USMS LONG DISTANCE NATIONAL CHAMPIONSHIP MEETS

- 1994 USMS 1 Hour Postal Championships, St. Louis Masters. January 1-January 31, 1994. Contact: Leo Letendre, 267 Glandore Drive, Manchester, MO 63021. Phone: (314)394-6395.
- 1994 USMS 6000 yard Postal Championships, Aliso Hills Swim Ranch. September 1 - November 30, 1994. Contact: Robert Mitchell, P.O. Box 204, El Toro, CA 92630. Phone: (714)581-1135.
- 1994 USMS 10 Kilometer Postal Championships, Berkeley Aquatics Masters. May 15-September 30, 1994. Contact: Cathy Copeland, 246 Berger Street, Somerset, NJ 08873. Phone: (980)828-4679.
- 1994 USMS 1 Mile Open Water Championships, O*H*I*O Masters, Edgewater State Park (Lake Erie), Ohio. August 7, 1994. Contact: Maureen Koss, 19680 Puritas, #251, Cleveland, OH 44135. Phone: (216)362-6301.

- 1994 USMS 2 Mile Cable Championships, Virginia Masters, Chris Greene Lake, Charlottesville, Virginia. July 9, 1994. Contact: Linda McCowan, 13613 Prince William Drive, Midlothian, VA 23113. Phone: (804)379-2537.
- 1994 USMS 1.5 Mile Open Water Championships, Adirondack Masters, Mirror Lake, Lake Placid, New York. July 16, 1994. Contact: Betsy Owens, 194 Lenox Avenue, Albany, NY 12208. Phone: (518)482-4278(h), (518)426-4055(w).
- 1994 USMS 5 Mile Open Water Championships, Minnesota Masters, Lake Minnetonka, Minnesota. August 6, 1994. Contact: Tom Rushfeldt, 310 Margaret Circle, Wayzata, MN 55391. Phone: (612)475-3403(h), (612)442-4000(w).
- 1994 USMS 8.2 Mile Open Water Championships, Southern Pacific Masters, Seal Beach (Pacific Ocean), California. July 16, 1994. Contact: Joe Klien, P.O. Box 853, Seal Beach, CA 90740. Phone: (310)430-9801.
- 1995 USMS 1 Hour Postal Championships, Georgia Killer Whales. January 1-31, 1995. Contact: Bill Black, 7040 Hunters Knoll, N.E., Atlanta, GA 30328. Phone: (404)698-8020.
- 1995 USMS 6000 Yard Postal Championships, Gulf LMSC. September 1-November 30, 1993. Contact: Kris Wingenroth, 3830 Drummond, Houston, TX 77025, Phone: (713)527-4077.
- 1995 USMS 10 Kilometer Postal Championships, Pacific Northwest Association. May 15-September 30, 1993. Contact: Jane Moore, 1867 58th Street, N.E., Tacoma, WA 98422. Phone: (206)925-0803.
- 1995 USMS 1 Mile Open Water Championships, Virginia Masters. June 18, 1995. Contact: Betsy Durrant, 211 66th Street, Virginia Beach, VA 23451. Phone: (804)422-6811.
- 1995 USMS 2 Mile Cable Championships, O*H*I*O Masters. July 22, 1995. Contact: Jan Huneke, 8068 Asbury Hills, Cincinnati, OH 45255. Phone: (513)231-8168
- 1995 USMS 2.7 Mile Open Water Championships, Long Beach Swim Club. July 16, 1995. Contact: Lucy Johnson, 769 Stanley Avenue, Long Beach, CA 90804. Phone: (310)433-5299 (h), (310)498-6501 (w).
- 1995 USMS 3.5 Mile Open Water Championships, International Swimming Hall of Fame. May 22, 1995. Contact: Stu Marvin, Hall of Fame Aquatic Complex, 501 Seabreeze Boulevard, Fort Lauderdale, FL 33316. Phone: (305)468-1580.
- 1995 USMS 11.8 Mile Open Water Championships, Coronado Masters. August, 1995. Contact: Dave Lamott, 2425 Palermo Drive, San Diego, CA 92106. Phone: (619)222-3436.

FINA/MSI CHAMPIONSHIP MEETS

- 1994 FINA World Championships, Montreal, Quebec, Canada. July 4-9, 1994. Contact: Rendez-vous 94 Montreal, 4545, avenue Pierre-de-Coubertin, Case postale 1000, Succursale <<M>>>, Montreal, Quebec, Canada, H1V 3R2.
- 1994 World Masters Games, Brisbane, Queensland, Australia. Sept. 28-Oct. 3, 1994. Contact: General Manager, World Masters Games, Locked Bag 1994, G.P.O. Brisbane, 4001, Queensland, Australia. Phone: +61 7 405 0999.

APPENDIX D

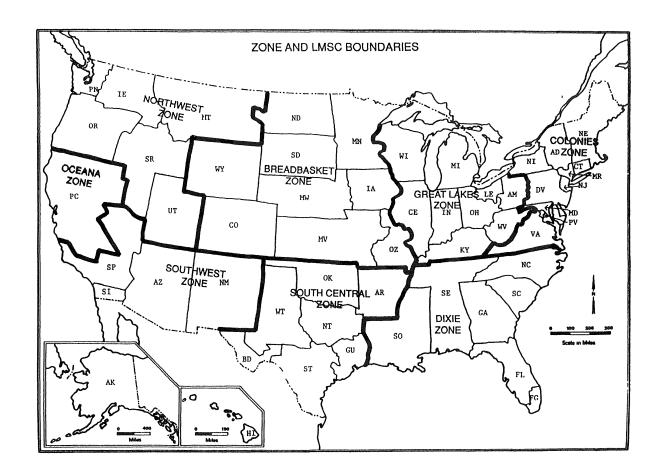
ZONE AND LMSC BOUNDARIES

ZONES

- Breadbasket Colorado, Iowa, Midwestern, Minnesota, Missouri Valley, North Dakota, Ozark, South Dakota, Wyoming.
- Colonies Adirondack, Connecticut, Delaware Valley, Maryland, Metropolitan, New England, New Jersey, Niagara, Potomac Valley, Virginia.
- Dixie Florida, Florida Gold Coast, Georgia, North Carolina, South Carolina, Southeastern, Southern.
- Great Lakes Allegheny Mountain, Central, Indiana, Kentucky, Lake Erie, Michigan, Ohio, West Virginia, Wisconsin.
- Northwest Alaska, Inland Empire, Montana, Oregon, Pacific Northwest, Snake River, Utah.
- Oceana Hawaii, Pacific.
- South Central Arkansas, Border, Gulf, Oklahoma, North Texas, South Texas, West Texas.
- Southwest Arizona, New Mexico, San Diego/Imperial, Southern Pacific.

LMSC NUMERIC CODES AND ABBREVIATIONS

3	AD	Adirondack	7	NJ	New Jersey
56	AK	Alaska	42	NM	New Mexico
11	AM	Allegheny Mountain	4	NI	Niagara
48	ΑZ	Arizona	13	NC	North Carolina
23	AR	Arkansas	52	ND	North Dakota
53	BD	Border	- 26	NT	North Texas
21	CE	Central	17	OH	Ohio
32	CO	Colorado	27	OK	Oklahoma
5	CT	Connecticut	37	OR	Oregon
8	DV	Delaware Valley	22	OZ	Ozark
14	FL	Florida	38	PC	Pacific
50	FG	Florida Gold Coast	36	PN	Pacific Northwest
45	GA	Georgia	10	PV	Potomac Valley
25	GU	Gulf	44	SI	San Diego-Imperial
39	HI	Hawaii	59	SR	Snake River
16	IN	Indiana	55	SC	South Carolina
35	ΙE	Inland Empire	54	SD	South Dakota
40	IA	lowa	43	ST	South Texas
41	ΚY	Kentucky	15	SE	Southeastern
18	LE	Lake Erie	24	so	Southern
9	MD	Maryland	33	SP	Southern Pacific
6	MR	Metropolitan	34	UΤ	Utah
19	MI	Michigan	12	VA	Virginia
29	MW	Midwestern	46	WT	West Texas
30	MN	Minnesota	47	W۷	West Virginia
28	MV	Missouri Valley	20	W١	Wisconsin
31	MT	Montana	58	WY	Wyoming
2	NE	New England			



LMSC BOUNDARIES

Adirondack - The State of New York east and north of Oswego, Onondaga, Cortland, Broome, Sullivan, Orange, and Dutchess Counties.

Alaska - The State of Alaska.

Allegheny Mountain - The State of Pennsylvania west of Potter, Clinton, Center, Huntingdon, and Bedford Counties. In the State of West Virginia the Counties of Marshall, Brooke, Ohio, and Hancock. In the State of Ohio the Counties of Columbiana, Belmont, and Jefferson.

Arkansas - The State of Arkansas. In the State of Texas the County of Bowie.

Arizona - The State of Arizona.

Border - In the State of Texas the Counties of El Paso, Hudspeth, Culberson, Jeff Davis, Presidio, Brewster, Terrell, and Crockett.

Central - The State of Illinois except the Counties of St. Clair, Calhoun, Greene, Jersey, Monroe, and Madison.

Colorado - The State of Colorado.

Connecticut - The State of Connecticut.

Delaware Valley - The State of New Jersey south of Mercer and Monmouth Counties. The State of Delaware. In the State of Maryland the County of Cecil. The State of Pennsylvania east of and including Potter, Clinton, Center, Huntingdon, and Bedford Counties.

Florida - The State of Florida except the Counties of Palm Beach, Broward, Dade, Monroe, and that part of Hendry County east of Route 833; and also excluding the Counties of Escambia, Santa Rosa, Okaloosa, Walton, Holmes, Washington, Bay, and that part of Calhoun and Jackson Counties west of the Apalachicola River.

Florida Gold Coast - In the State of Florida the Counties of Palm Beach, Broward, Dade, Monroe, and that part of Hendry County east of Route 833.

Georgia - The State of Georgia.

Gulf - That part of the State of Texas bounded on the north and including the Counties of Robertson, Leon, Houston, Angelina, Nacogdoches, and Shelby; on the east by the State of Louisiana; on the south by the Gulf of Mexico; and on the west by and including the counties of Fort Bend, Wharton, Colorado, Waller, Grimes, Robertson, Brazos, and Matagorda.

Hawaii - The State of Hawaii.

Indiana - The State of Indiana except the Counties of Floyd and Clark.

Inland Empire - In the State of Washington the Counties of Okanogan, Chelan, Douglas, Ferry, Stevens, Spokane, Lincoln, Grant, Kittitas, Asotin, Columbia, Yakima, Franklin, Adams, Whitman, Walla Walla, Garfield, Benton, Pend Oreille, and that portion of Klickitat County east of Highway 97 and including the City of Goldendale. In the State of Idaho the Counties of Bonner, Kootenai, Shoshone, Benewah, Latah, Lewis, Nez Perce, Idaho, Clearwater, and Boundary.

Iowa - The State of Iowa except the Counties of Lyon, Osceola, Sioux, O'Brien, Plymouth, Cherokee, Woodbury, Ida, Monona, Crawford, Harrison, Shelby, Pottawattamie, Mills, Montgomery, Freemont, and Page.

Kentucky - The State of Kentucky except the Counties of Campbell, Kenton, and Boone. In the State of Indiana the Counties of Floyd, and Clark.

Lake Erie - In the State of Ohio the Counties of Tuscarawas, Seneca, Crawford, Erie, Huron, Richland, Lorain, Ashland, Cuyahoga, Medina, Lake, Geauga, Portage, Stark, Ashtabula, Trumbull, Mahoning, Summit, and Wayne.

Maryland - The State of Maryland except the Counties of Cecil, Montgomery, and Prince Georges.

Metropolitan - The State of New York south of and including Sullivan, Orange, and Dutchess Counties.

Michigan - The State of Michigan.

Midwestern - The State of Nebraska. In the State of Iowa the Counties of Lyon, Osceola, Sioux, O'Brien, Plymouth, Cherokee, Woodbury, Ida, Monona, Crawford, Harrison, Shelby, Pottawattamie, Mills, Montgomery, Freemont, and Page.

Minnesota - The State of Minnesota. In the State of Wisconsin the Counties of St. Croix, Dunn, and Pierce.

Missouri Valley - The State of Kansas. The State of Missouri including and bounded by the Counties of Schuyler, Adair, Macon, Randolph, Audrain, Callaway, Cole, Moniteau, Morgan, Benton, Hickory, Polk, Greene, Christian, and Taney.

Montana - The State of Montana except the Counties of Dawson and Wibaux.

New England - The States of New Hampshire, Vermont, Massachusetts, Rhode Island, and Maine.

New Jersey - The State of New Jersey north of and including the Counties of Mercer and Monmouth.

New Mexico - The State of New Mexico.

Niagara - The State of New York west of and including the Counties of Oswego, Onondaga, Cortland, and Broome.

North Carolina - The State of North Carolina except the Counties of Camden, Currituck, and Pasquotank.

North Dakota - The State of North Dakota. In the State of Montana the Counties of Dawson and Wibaux.

North Texas - The State of Texas bounded on the south but not including the Counties of Callahan, Brown, Mills, Lampasas, Bell, Milan, Robertson, Leon, Houston, Angelina, Nacogdoches, and Shelby; on the east by the State of Louisiana, the State of Arkansas, and the County of Bowie, Texas; on the north by the State of Oklahoma and the County of Bowie, Texas; and on the west by the Counties of but not including Hardeman, Foard, Knox, Haskell, and Jones.

Ohio - The State of Ohio except the Counties of Seneca, Crawford, Columbiana, Erie, Huron, Richland, Lorain, Ashland, Cuyahoga, Medina, Lake, Geauga, Portage, Stark, Ashtabula, Trumbull, Mahoning, Summit, Wayne, Belmont, Lawrence, Washington, Jefferson, and Tuscarawus. In the State of Kentucky the Counties of Campbell, Kenton, and Boone.

Oklahoma - The State of Oklahoma.

Oregon - The State of Oregon except Malheur County. In the State of Washington the Counties of Cowlitz, Clark, Skamania, and that portion of Klickitat County west of Highway 97.

Ozark - The State of Missouri east of and including the Counties of Scotland, Knox, Shelby, Monroe, Pike, Montgomery, Osage, Miller, Camden, Dallas, Webster, Douglas, and Ozark. In the State of Illinois the Counties of Calhoun, Greene, Jersey, Madison, St. Clair, and Monroe.

Pacific - The State of California north of but not including the Counties of San Luis Obispo, Ventura, Los Angeles, and San Bernardino. In the State of Nevada the Counties of Humboldt, Washoe, Lyon, Storey, Mineral, Douglas, Churchill, Pershing, Lander, and Carson City.

- Pacific Northwest The State of Washington west of but not including the Counties of Okanogan, Chelan, Kittitas, and Yakima, and north of but not including the Counties of Cowlitz, Skamania, and Klickitat.
- Potomac Valley The District of Columbia. In the State of Maryland the Counties of Montgomery and Prince Georges. In the Commonwealth of Virginia the Counties of Arlington and Fairfax and the Cities of Alexandria, Fairfax, and Falls Church.
- San Diego-Imperial In the State of California the Counties of San Diego and Imperial.
- Snake River The State of Idaho except the Counties of Boundary, Bonner, Kootenai, Shoshone, Benewah, Latah, Clearwater, Nez Perce, Lewis, and Idaho. In the State of Nevada the Counties of Elko, White Pine, and Eureka. In the State of Oregon the County of Malheur.
- South Carolina The State of South Carolina.
- South Dakota The State of South Dakota.
- South Texas The State of Texas bounded on the east by and including the Counties of Milam, Burleson, Washington, Austin, Fayette, Lavaca, and Jackson; on the south by the Gulf of Mexico and the Republic of Mexico; on the west by and including the Counties of Val Verde, Sutton, and Schleicher; and on the north by and including the Counties of Menard, Mason, Llano, Burnet, Lampasas, and Bell.
- Southeastern The State of Alabama. The State of Tennessee. In the State of Florida the Counties of Escambia, Santa Rosa, Okaloosa, Walton, Holmes, Washington, and Bay, and that part of Jackson and Calhoun Counties west of the Apalachicola River.
- Southern The States of Louisiana and Mississippi.
- Southern Pacific In the State of California the Counties of San Luis Obispo, Ventura, Los Angeles, San Bernardino, Orange, Riverside, and Santa Barbara. In the State of Nevada the Counties of Clark, Esmeralda, Lincoln, and Nye.
- Utah The State of Utah.
- Virginia The Commonwealth of Virginia except the Counties of Arlington and Fairfax and the Cities of Alexandria, Fairfax, and Falls Church. In the State of North Carolina the Counties of Camden, Currituck, and Pasquotank.
- West Texas The State of Texas bounded on the south and including the Counties of Reeves, Pecos, Upton, Reagan, Irion, Tom Green, Concho, McCulloch, and San Saba; on the west by New Mexico; on the north by the State of Oklahoma; on the east by the State of Oklahoma and by and including the Counties of Hardeman, Foard, Knox, Haskell, Jones, Callahan, Brown, Mills, and San Saba.
- West Virginia The State of West Virginia except the Counties of Hancock, Brooke, Ohio, and Marshall. In the State of Ohio the Counties of Lawrence and Washington.
- **Wisconsin** The State of Wisconsin except the Counties of St. Croix, Dunn, and Pierce.
- Wyoming The State of Wyoming.

APPENDIX E

USMS DIRECTORY

USMS Executive Committee

President	Mel Goldstein
Vice President	Jim Miller
Secretary	Suzanne Rague
Treasurer	Lucy Johnson
Past President	Daniel Gruender
Legal Counsel	Jack Geoghegar
-	Betsv Durrant

USMS National Office

Executive	e Secretary	Dorothy Donnelly
National	Registrar	Diane and Bill Black

Zone Representatives and LMSC Chairmen

Breadbasket Zone - Todd Samland

Colorado	George Kenry
lowa	Andrea Dorn
Midwestern	Patrick Dibiase
Minnesota	Wayde Mulhern
Missouri Valley	Fran Fields
North Dakota	Will Gosnold
Ozark	Leo Letendre
South Dakota	Kathy Grady
Wyoming	Thomas Bryant

Colonies Zone - Tom Lyndon

Adirondack	Betsy Owens
Connecticut	Jerianne Donnelly
Delaware Valley	
•	Andy Kramer
Maryland	Barbara Protzman
Metropolitan	Lorraine Martinelli
New England	Ann McDermott
New Jersey	Cathy Copeland
Niagara	Betty Barry
Potomac Valley	Thomas Denes
Virginia	Jim Miller

Dixie Zone - Scott Rabalais

Florida	orge Genzalez sa Watson ennis Watsor avid Parler at Wilson indy Hale
Great Lakes Zone - Frank L. "Skip	" Thompson
Allegheny Mountain S Central M Indiana S Kentucky W Lake Erie P Michigan W Ohio P Wisconsin Jo	lichael Hogarty haron Wise /illiam Tingley ierce Bray /illiam T. Reid III at Maley
Northwest Zone - John F.	Zeli
Alaska Jo Inland Empire C Montana S Oregon Jo Pacific Northwest P Utah A	huck Tasca teven Holloway ohn F. Zell ane Moore taula Howard
Oceana Zone - Jim Whee	eler
HawaiiB PacificJ	
South Central Zone - Craig	Tribuzi
Arkansas	Oon Mehl (ris Wingenroth Craig Tribuzi Dennis Wilson Marcia Marcantonio Mark Stout
Southwest Zone - Steve Sc	
Arizona	oseph Tesmer Bobbi Turcotte

Page 132 APPENDIX E

Michael Heather *

Frank Newquist

USMS COMMITTEES (Chairman *):

Championship Committee

Bonnie Adair Pat Maley Paul Windrath
Carolyn Boak Stu Marvin
Gene Donner Bill Mulliken Medical Coordinator:
Emmett Hines Sandi Rousseau * Jim Miller

Emmett Hines Sandi Rousseau *
Cathy Kohn Maury Schott

Coaches Committee

Cris Allen Clay Evans Krista Phillips
Carl Chittim Paul Fortoul Todd Samland
Michael Collins * Lorraine Martinelli Greg Spire
Marilyn Early Don Mehl John N. Zell

Convention Committee

Mike Calwell Roxanne Motter Joanne Tingley Carolyn Cunningham Art Mayer William Tingley *

Finance Committee

Nicholas G. Fazzano Richard T. Smith Ex-Officio:

Mike Hogarty Leslie Ronacher Roy Abramowitz

John Maguire Anna Lea Roof Jeanne Ensign

Bob Merrick David Zander * Lucy Johnson

Fitness Committee

Betty Barry

Bud Jackson

Betsy Owens *

Barbara Bower

Mo Chambers

David Grilli

Eric Guest

Bud Jackson

Betsy Owens *

Dore Schwab

Dore Schwab

Marie Kriepe

Joe Tesmer

Rhea Wilkins

Terry Laughlin

Sharon Wise

Insurance Committee

Laura CalwellMichael Laux *Forrest SullivanColleen DriscollAlan LevinsonBill WeirBill HallBob MitchellChristine WinnAndy Kramer

Internal Audit Committee

Jeanne Ensign * Richard T. Smith

International Committee

Judy Bonning Peggy Buchannan D. Barr Clayson Dorothy Donnelly

Rowdy Gaines F. Ted Haartz Joseph Kurtzman * Shannon Sullivan

Phil Whitten Ex-Officio: June Krauser Walt Reid

Legislation Committee

Jack Buchannan Hill Carrow Leslie Cooper Rob Copeland Jeanne Crouse

Darlynne Ferguson Edie Gruender Marcia Marcantonio Libby Neufeld

Hugh Winn Elin Zander John F. Zell

Jerianne Donnelly * Bill Earley

Julie Paque William Reid Frank Tillotson Ex-Officio: Jack Geoghegan

Long Distance Committee

Peter Crumbine Sally Ann Dillon * David Gray

Maureen Koss David Lamott Kevin Polansky Lisa Watson Robert Zeitner

Lynn Hazelwood Barney Hungerford Steve Schofield Craig Tribuzi

Ex-Officio: Syd Cassidy

Marketing/Publications Committee

Carol Brandon Pierce Bray Rich Burns Mark Clark Laura Hatfield Janice Krauser Tom Lyndon Linda McCowan Debbie Morrin Nancy Ridout *

Gerry Rodrigues MaryLou Schulz Mary Lee Watson Jim Wheeler

Planning Committee

Bill Black

George Cunningham Barbara Frid

Cindy Hale

Edna Laflin Nancy Miller

Hugh Moore Huddy Murray Skip Thompson Stephanie Walsh *

Pat Wilson **Ruth Winn**

Records and Tabulation Committee

Lou Abel Ceil Blackwell Bob Eberwine Dan Per-Lee Ginger Pierson Kim Shaw Joan Smith

David Morrow

Barbara Protzman

Walt Reid *

Mary Beth Windrath

Page 134 APPENDIX E

Patricia Diehl

Registration Committee

Cindy Ayers Robert Koenig Diane Reed
Bruce Clark Charles Kohnken Elleen Schappel
Frandrie Harmeson Barbara Larsen * Ex-Officio:
Sarah Hromada Adrienne Pipes Diane Black

Rule Book Committee

Dorothy Donnelly

Lil Haneman

David Levinson

Marilyn Fink

Stephen Hogan

Meg Smath *

Phyllis Gill

Rules Committee

Thomas Boak, Jr. * Barry Fasbender Thom Tripp
Kathy Casey Janet Kavadas Bobbi Turcotte
Catie Cooper June Krauser Kris Wingenroth
David Diehl Leo Letendre

Sports Medicine, Health and Safety Committee

David Costill * Bob McMurray Laura Val
George Kenry Jane Moore
Ernie Maglischo George Quigley Ex-Officio:
Ann McDermott Manuel Sanguily Don Mehl

Zone Committee

Betsy Durrant * Todd Samland Craig Tribuzi
Tom Lyndon Steve Schofield Jim Wheeler
Scott Rabalais "Skip" Thompson John F. Zell

Ad Hoc Officials Committee

Al Winslow

Judy Gillies George McVey

Joan Glaraton Michael Moore Ex-Officio:
Pam Himstreet Tori Smith Larry Rice

Bill Koerber

Ad Hoc Recognition and Awards Committee

Hamilton Anderson Jack Geoghegan Julie Paque * Mildred Anderson Daniel Gruender Harry Rawstrom Walt Reid Cindy Baxter Edie Gruender Bob Beach F. Ted Haartz John Spannuth Thomas D. Boak Paul Hutinger Ray Taft Zada Taft Kathy Casey June Krauser Michael Laux Enid Uhrich Dorothy Donnelly Gail Dummer Wayde Mulhern

Special Appointments and Liaisons

Controller - Roy Abramowitz
FINA Representative - June Krauser
Historian - Joan Smith
International Swimming Hall of Fame Liaison - June Krauser
MSI Representative - Mel Goldstein
Swim Magazine Editor - Scott Rabalais
United States Aquatic Sports Representative - Mel Goldstein
United States Swimming Liaison - F. Ted Haartz
YMCA Liaison - Mel Goldstein
Parliamentarian - Bill Mulliken

ALPHABETICAL DIRECTORY

Lou Abel, 12 Westchester Ave #2K, White Plains NY 10601 Roy Abramowitz, POB 40313, Portland OR 97240 Bonnie Adair, 1319-B Harvard St, Santa Monica CA 90404-2436 Cris Allen, 1527 Florida St, San Francisco CA 94110-4851 Hamilton Anderson, 506 Bolivar, Bellaire TX 77401 Mildred Anderson, 506 Bolivar, Bellaire TX 77401 Cindy Ayers, 3 Greenblade Lane, The Woodlands TX 77350

Betty Barry, 1043 Victor Holcomb Rd, Victor NY 14564 John Bauman, 11616 W Greenfield Ave, Apt. 23, West Allis WI 53214 Cindy Baxter, 740 Clara Dr, Palo Alto CA 94303 Bob Beach, 1 Beach Dr, #1801, St. Petersburg FL 33701 Bill Black, 7040 Hunters Knoll, NE, Atlanta GA 30328 Diane Black, 7040 Hunters Knoll, NE, Atlanta GA 30328 Ceil Blackwell, 4305 John Rencher Wynd, Raleigh NC 27612 Carolyn Boak, 1457 Tyler Pkwy, Mountain View CA 94040 Thomas D. Boak, 15 Sawmill Grove Lane, The Woodlands TX 77380 Judy Bonning, 9975 W Atlantic Blvd, Coral Springs FL 33071 Barbara Bower, 600 Haring Road, Metairie LA 70001 Carol Brandon, 6771 E Baker, Tucson AZ 85710 Pierce Bray, 31175 Northwood Dr, Cleveland OH 44124 Thomas Bryant, 1260 N 18 St, Laramie WY 82070 Jack Buchannan, POB 599, Kittredge CO 80457 Peggy Buchannan, POB 599, Kittredge CO 80457 Rich Burns, 24 Barber Ave, San Anselmo CA 94960

Laura Calwell, 5610 W 61 Terr, Shawnee Mission KS 66202
Mike Calwell, 5250 W 94th Terr, Prairie Village KS 66207
Hill Carrow, %Sara Lee, 450 Haines Mill Rd, Winston Salem NC 27619
Kathy Casey, 11114 -111 St SW, Tacoma WA 98498
Syd Cassidy, #1 Hurricane Dr, Coral Gables FL 33146
Mo Chambers, 12101 Stonebrook Dr, Los Altos Hills CA 94022
Carl Chittim, 7231 E Diamond St, Scottsdale AZ 85257
Bruce Clark, 46-459 Hololio St, Kaneohe HI 96744
Mark Clark, 111 Douglas Dr, Wylie TX 75098-3764

Page 136 APPENDIX E

D. Barr Clayson, 60 Hidden Rd, Weston MA 02193
Michael Collins, POB 1366, Davis CA 95617
Catie Cooper, 9775 SW 52nd Rd, Gainesville FL 32608
Leslie Cooper, 16536 Willow Glen, Grover MO 62040
Rob Copeland, 246 Berger St, Somerset NJ 08873
David Costill, 3907 W Ethel, Muncie IN 47304
Jeanne Crouse, 600 Marcia Lane, Rockville MD 20851
Peter Crumbine, 3 Copper Beech Rd, Greenwich CT 06830
George Cunningham, 270 Sunnycroft Rd, Ben Lomond CA 95005
Carolyn Cunningham, 270 Sunnycroft Rd, Ben Lomond CA 95005

Kathy Dean, 4004 S Louise Ave # 307, Sioux Falls SD 57106-2336 Thomas Denes, 4522 Everett, Kensington MD 20895
Patrick Dibiase, 10707 Pacific St # 101, Omaha NE 68114-4700
David Diehl, 12511 Littleton St, Silver Spring MD 20906
Patricia Diehl, 12511 Littleton St, Silver Spring MD 20906
Sally Ann Dillon, POB 9499, Truckee CA 96162
Dorothy Donnelly, 2 Peter Ave, Rutland MA 01543
Jerianne Donnelly, 2 Peter Ave, Rutland MA 01543
Gene Donner, 717 South Rd, East Aurora NY 14052
Andrea Dorn, 904 13th St, Nevada IA 50201
Colleen Driscoll, 100 S Village Ave, #1C, Rockville Centre NY 11570
Gail Dummer, 3100 Scarborough Rd, Lansing MI 48910
Betsy Durrant, 211 - 66th St, Virginia Beach VA 23451

Bill Earley, 475 C Ave, Coronado CA 92118-1822 Marilyn Early, 570 E Main St #1, Harbor Springs MI 49740 Bob Eberwine, 7525 W Manchester Ave #527, Los Angeles CA 90045 Jeanne Ensign, 600 Malden East #102, Seattle WA 98112-4500 Clay Evans, 11405 Biona Dr, Los Angeles CA 90066

Barry Fasbender, 845 Talisman Dr, Palo Alto CA 94303 Nicholas G. Fazzano, 259 Benefit St, #3, Providence RI 02903 Darlynne Ferguson, PO Box 8005, Canton OH 44711 Fran Fields, 11408 E 20th St, Independence MO 64052 Marilyn Fink, 5518 Laramie Way, San Diego CA 92120 Paul Fortoul, 1370 St Nicholas Ave # 20 S, New York NY 10033 Barbara Frid, 6105 Chapman Road, Lorton VA 22079

Rowdy Gaines, 6800 Hawaii-Kai Dr, Honolulu HI 96825
Jack Geoghegan, 155 Osborn Rd, Rye NY 10580
Phyllis Gill, 14037 SE Allen Rd, Bellevue WA 98006
Judy Gillies, 2596 N Ironwood Ridge Dr, Tucson AZ 85745
Joan Glaraton, 4590 Colonial Ave, Jacksonville FL 32210
Mel Goldstein, 6456 Broadway, Indianapolis IN 46220
Jorge Gonzalez, 1245 Rodman St, Hollywood FL 33020
Will Gosnold, RR2 Box 60G, Grand Forks ND 58201
David Gray, 742 Calderon Ave, Mountain View CA 94041-2314
David Grilli, 261 High Range Rd, Londonderry NJ 03053
Daniel Gruender, 3329 N Valencia Lane, Phoenix AZ 85018

Edie Gruender, 3329 N Valencia Lane, Phoenix AZ 85018 Eric Guest, 44861 SE Hwy 26, Sandy OR 97055

F. Ted Haartz, 155 Pantry Rd, Sudbury MA 01776-1112 Cindy Hale, 103 Camelia, Covington LA 70433 Bill Hall, 1310 Chippewa, Richardson TX 75080 Lil Haneman, 1003 SE 6th St, Deerfield Beach FL 33441 Francine Harmeson, 5803 20th Ave NW, Seattle WA 98107 Laura Hatfield, Intl Hall Fame, 1 Hall of Fame Dr, Ft. Lauderdale FL 33316 Lynn Hazlewood, 11714 Decade Ct, Reston VA 22091 Michael Heather, 434 E Duarte Rd, Monrovia CA 91016 Zena Herrmann, 16204 135th Ave SE, Renton WA 98058-6905 Pam Himstreet, 14744 NW Bonneville PI, Beaverton OR 97006 Emmett Hines, 4361 Graduate Circle, Houston TX 77004 Stephen Hogan, 5826 First Landing Way, Burke VA 22015 Michael Hogarty, 7442 Adams St #2H, Forest Park IL 60130 Steven Holloway, 232 S 6th West, Missoula MT 59801 Paula Howard, 1732 Federal Way, Boise ID 83705 Sarah Hromada, 7501 W 101 St #118, Bloomington MN 55438 Barney Hungerford, 4 Knox Ct Chesterbrook, Wayne PA 19087 Paul Hutinger, 1755 Georgia Ave NE, St. Petersburg FL 33703-4326

Bud Jackson, 6411 Park Ave, Fort Smith AR 72903 Edie Jacobsen, 1786 Maricopa Dr, Oshkosh WI 54904 Lucy Johnson, P.O. Box 3368, Long Beach CA 90803

Janet Kavadas, 217 Alder St #305, Edmonds WA 98020
George Kenry, 6786 W Leawood Dr, Littleton CO 80123
Robert Koenig, 24 E Sharon Rd, Cincinnati OH 45246
Bill Koerber, 12062 W Cross Ave #1-305, Littleton CO 80123
Cathy Kohn, 840 S Meramec, Clayton MO 63105
Charles Kohnken, 1258 Flushing Ave, Clearwater FL 34624
Maureen Koss, 19680 Puritas #251, Cleveland OH 44135
Andy Kramer, 116 Windermere Ave #F3, Wayne PA 19807
Janice Krauser, 1404 NE 23rd, Ft. Lauderdale FL 33305
June Krauser, 2308 NE 19th Ave, Ft. Lauderdale FL 33305
Marie Kreipe, 7138 SE 2nd St, Tecumseh KA 66542
Joseph Kurtzman, 90 Chadwick Dr, Charleston SC 29407-7470
Mary Kuskowski, 111 E Lakeshore Dr, Barrington IL 60010

Edna Laflin, 19838 Star Ridge Dr, Sun City West AZ 85375
David Lamott, 2425 Palermo Dr, San Diego CA 92106
Barbara Larsen, 5223 N Pennsylvania St, Indianapolis IN 46220
Terry Laughlin, 381 Main St, Goshen NY 10924
Michael Laux, POB 5, Westport CT 06881
Leo Letendre, 267 Glandore Dr, Manchester MO 63021
Alan Levinson, 4301 Anderson Ave, Oakland CA 94619
David Levinson, 3375 Alma St # 172, Palo Alto CA 94306
Tom Lyndon, 9 Sunset Rd, Wellesley MA 02181

Page 138 APPENDIX E

Ernie Maglischo, Intercoll. Ath. Complex, Arizona St Univ, Tempe AZ 85287

John Maguire, 4033-12th St NE, St. Petersburg FL 33703

Pat Maley, 5450 Foley Rd, Cincinnati OH 45238

Marcia Marcantonio, 8340 Fathom Circle # 702, Austin TX 78750

Lorraine Martinelli, 174 Gelston Ave, Brooklyn NY 11209-7010

Stu Marvin, 6780 NW 31st Way, Ft. Lauderdale FL 33309

Art Mayer, 1024 Elkton Rd, Newark DE 19711

Linda McCowan, 13613 Prince William Dr, Midlothian VA 23113

E. Don McCullough, 937 Ridgecrest Dr, Vermillion SD 57089

Ann McDermott, 174 W Brookline St #4, Boston MA 02118

Bob McMurrey, Univ N Carolina, CB 8700 Fetzer Gym, Chapel Hill NC 27599-8700

George McVey, 447 Antiers Dr. Rochester NY 14618

Don Mehl, 600 Willow Glen Dr, El Paso TX 79922

Bob Merrick, 10572 Mahonev Dr. Sunland CA 91040

Jim Miller, 1471 Johnston-Willis Dr, Richmond VA 23235

Nancy Miller, 3741 Reeds Landing Circle, Midlothian VA 23113

Bob Mitchell, POB 204, El Toro CA 92630

Hugh Moore, 1867 58th St NE, Tacoma WA 98422-1517

Jane A. Moore, 1867 58th St NE, Tacoma WA 98422-1517

Michael Moore, 350 Wayland, San Francisco CA 94134

Debbie Morrin, 6100 Westchester Park Dr #605, College Park MD 20740

David Morrow, 2105 Maryland Ave, Louisville KY 40205

Roxanne Motter, 108 Tiffany Rd, Bristol TN 37620

Wayde Mulhern, 570 96th Lane, Blaine MN 55434

Bill Mulliken, 7050 W 71st St, Chicago IL 60638-5902

Huddie Murray, 12206 Tanglewild, Austin TX 78758

Libby Neufeld, 26015 Apache Creek Rd, San Antonio TX 78258-5921

Frank Newquist, 2210 6th Ave #2B, Milton WA 98354

Betsy Owens, 194 Lenox Ave, Albany NY 12208

Julie Paque, 2203 Rock St, Mountain View CA 94043-2606

David Parler, POB 490, Folly Beach SC 29439

Dan Per-Lee, 28115 W Oakland Rd, Bay Village OH 44140

Krista Phillips, 9408 Hester Rd, Hurdle Mills NC 27541

Ginger Pierson, 7655 SW Cedar Crest St, Portland OR 97223

Adrienne Pipes, 832 Dewitt, Encinitas CA 92024

Kevin Polansky, 2433 Silver Fir, Loveland CO 80538

Stanley Prazer, 3805 Myrtle St, Erie PA 16508

Barbara Protzman, 7919 Main Falls Cir, Catonsville MD 21228

George Quigley, 7810 Providence Circle, Indianapolis IN 46250

Scott Rabalais, 950 S Foster Dr #29, Baton Rouge LA 70806

Suzanne Rague, 935 NW 170th PI, Beaverton OR 97006

Doug Rawn, 12 Foxhunt Trail, Little Rock AR 72207-2403

Harry Rawstrom, 713 Colgate Ln, Newark DE 19711

Diane Reed, 1093 Main St, Norwell MA 02061

Walt Reid, POB 8800A, Steilacoom WA 98388

William T. Reid III, 128 Marlboro Ct, Brooklyn MI 49230

William T. Reid III, 128 Marlboro Ct, Brooklyn MI 49230 Larry Rice, 507 Lakeview Way, Redwood City CA 94062 Nancy Ridout, 580 Sunset Parkway, Novato CA 94947 Gerry Rodrigues, 11930 Mayfield #10, Los Angeles CA 90401 Leslie Ronacher, 7622 Alcomita, Houston TX 77083 Anna Lea Roof, 5937 Dearborn #301, Mission KS 66202 Sandi Rousseau, 23995 SW Drake Lane, Hillsboro OR 97123

Todd Samland, 12613 Burt St. Omaha NE 68154 Manuel Sanguily, 150 White Plains Road, Tarrytown NY 10591 Elleen Schappel, 932 W Outer Dr. Oak Ridge TN 37830 Steve Schofield, 7914 Sadring St, West Hills CA 91304 Maury Schott, 522 Willowbrook Dr. Greensboro NC 27403 MaryLou Schulz, 109 Westchester Dr N. Delmar NY 12054 Dore Schwab, POB 772, Gray Oaks, Ross CA 94957-0772 Kim Shaw, 402 Santa Fe Trail #35, Irving TX 75063 Meg Smath, 3511 Olympia Rd, Lexington KY 40517 Joan Smith, 4309 Surita St, Sacramento CA 95864 Richard T. Smith, 4309 Surita St, Sacramento CA 95864 Tori Smith, 8734 Blankenship Dr, Houston TX 77080 John Spannuth, POB 3279, Boynton Beach FL 33424 Greg Spire, 1620 Edgemont St, San Diego CA 92102 Mark Stout, 2603 21st St, Lubbock TX 79410 Forrest Sullivan, 1752 N Woodhouse Rd, Virginia Beach VA 23454-1634 Shannon Sullivan, 8502 Gulana Ave, Playa Del Rey CA 90293

Ray Taft, 230 Gennessee St, San Francisco CA 94112-1345
Zada Taft, 230 Gennessee St, San Francisco CA 94112-1345
Chuck Tasca, E 18005 8th Ave, Greenacres WA 99016
Annette Taylor, 4286 Lynne Ln, Salt Lake City UT 84124
Joseph Tesmer, 408 Rover Blvd, Los Alamos NM 87544
Jeff Thibodeau, 1407 Shadowbend Dr, Houston TX 77043
Frank L. "Skip" Thompson, 2660 Littletell Ave, West Bloomfield MI 48324
Frank Tillotson, 2494 13th Ave N #46, St. Petersburg FL 33713
Joanne Tingley, 2107 Eastview Ave, Louisville KY 40205
William Tingley, 2008 Trevilian Way, Louisville KY 40205
Craig Tribuzi, 2302 Saharah Dr, Garland TX 75044
Thomas Tripp, 5420 Clark State Rd, Gahanna OH 43230
Bobbi Turcotte, 3098 Rue d'Orleans, San Diego CA 92110

Enid Uhrich, 1509 Bunker Hill Rd, Sun City Center FL 33573

Laura Val, 2922 Miles Dr, Santa Clara CA 95051

Stephanie Walsh, 27 E Central Ave #J-5, Paoli PA 19301
Dennis Watson, 2851 Burlwood Dr, Winston-Salem NC 27103-6205
Lisa Watson, 804 Howell Ct, Duluth GA 30136
Mary Lee Watson, 6613 Rolling Fork Drive, Nashville TN 37205
Bill Weir, 217 Maple Tree Drive, Bristol TN 37620
Kirsten Weiss, 1900 E Campus Dr #1, Austin TX 78705
Jim Wheeler, 2298 First St # C, Livermore CA 94550

Page 140 APPENDIX E

Phill Whitten, POB 624, Marblehead MA 01945
Rhea Wilkins, 1607 Darrell Dr, Midlothian VA 23113
Dennis Wilson, 820 N Quebec, Tulsa OK 74115
Pat Wilson, 842 W Alabama St, Florence AL 35630
Mary Beth Windrath, 2612 Eunice Ave, Red Wing MN 55066-4107
Paul Windrath, 2612 Eunice Ave, Red Wing MN 55066-4107
Kris Wingenroth, 3830 Drummond, Houston TX 77025
Christine Winn, 420 Fawn Dr, San Anselmo CA 94960
Hugh Owen Winn, 420 Fawn Dr, San Anselmo CA 94960
Ruth Winn, 420 Fawn Dr, San Anselmo CA 94960
Al Winslow, 245 E 37th St Cellar Apt, New York NY 10016
Sharon Wise, 1025 Mount Auburn Dr, Indianapolis IN 46224

David Zander, South 13927 Traver Lane, Valleyford WA 99036 Elin Zander, South 13927 Traver Lane, Valleyford WA 99036 Robert Zeitner, 3845 N Oakley Ave, Chicago IL 60618 John F. Zell, 4640 NE 36th Ave, Portland OR 97211 John N. Zell, POB 230125, Anchorage AK 99523

APPENDIX F

USMS HISTORY

Recipients of the Ransom J. Arthur Award

This award is given in honor of Captain Ransom J. Arthur, M. D., who, by his sacrifice, perseverance, and dedication to improving the health of adults through swimming, established the Masters swimming program in the United States. The award is given annually to the person who has done the most to further the objectives of Masters Swimming.

1973	Ransom J. Arthur	1983	Dorothy Donnelly
1974	June Krauser	1984	Reg Richardson
1975	Hal Onnusseit	1985	Michael Laux
1976	F. Ted Haartz	1986	Judge Robert Beach
1977	Dr. Paul Hutinger	1987	Ross Wales
1978	Mildred Anderson	1988	John Spannuth
	Hamilton Anderson	1989	Daniel Gruender
1979	Zada Taft		Edie Gruender
1980	Enid Uhrich	1990	Jack Geoghegan
	Ed Reed, Sr.	1991	Thomas D. Boak
1981	Cindy Baxter	1992	Walter Reid
1982	Harry Rawstrom	1993	Kathrine Casey
			Gail Dummer

Recipients of the USMS Coach-of-the-Year Award

This award is presented annually to the coach who has done the most to further the objectives of Masters Swimming.

1986	Jim Miller	1991	Judy Bonning
1987	Kerry O'Brien	1992	Clay Evans
1988	Keith Bell		Gerry Rodriguez
1989	William Tingley	1993	Emmett Hines
1990	Michael Collins		

USMS National Championship Meets

	Short Course Championships			Lon	g Course Championsl	nips
Year	Date	Location	Swimmers	Date	Location	Swimmers
1970	May 2-3	Amarillo, TX	46			
1971	May 7-8	Amarillo, TX	108			
1972	May 19-21	San Mateo, CA	325	Aug. 11-13	Bloomington, IN	188
1973	May 18-20	Santa Monica, CA	500	Aug. 10-12	Chicago, IL	500
1974	May 17-19	Ft. Lauderdale, FL	561	Sept. 6-8	Santa Clara, CA	584
1975	May 16-18	Ft. Lauderdale, FL	663	Aug. 29-31	Knoxville, TN	394
1976	May 14-16	Mission Viejo, CA	800	Aug. 27-29	St. Louis, MO	514
1977	May 13-15	Ft. Lauderdale, FL	611	Aug. 25-28	Spokane, WA	525
1978	May 19-21	San Antonio, TX	560	8/31-9/3	Providence, RI	540
1979	May 4-7	Mission Viejo, CA	1020	Aug. 23-26	Dearborn, MI	689
1980	May 16-18	Ft. Lauderdale, FL	875	8/29-9/1	Santa Clara, CA	987
1981	May 23-26	Irvine, CA	1209	Aug. 13-16	Canton, OH	741
1982	May 21-24	The Woodlands, TX	910	Aug. 26-29	Portland, OR	915
1983	May 28-31	Ft. Lauderdale, FL	1208	Aug. 25-28	Indianapolis, IN	908
1984	May 26-29	Industry Hills, CA	1227	Aug. 23-26	Raleigh, NC	840
1985	May 10-13	Milwaukee, WI	1021	Aug. 17-20	Providence, RI	800
1986	May 15-18	Fort Pierce, FL	1231	Aug. 21-24	Portland, OR	933
1987	May 15-18	Stanford Univ., CA	2328	Aug. 21-24	The Woodlands, TX	872
1988	May 19-23	Austin, TX	1405	Aug. 25-28	Buffalo, NY	1071
1989	May 4-7	Boca Raton, FL	1755	Aug. 17-20	Grand Forks, ND	586
1990	May 18-21	Los Angeles, CA	1592	Aug. 17-20	The Woodlands, TX	829
1991	May 16-19	Nashville, TN	1529	Aug. 22-25	Elizabethtown, KY	720
1992	May 21-24	Chapel Hill, NC	1502	Aug. 20-23	Federal Way, WA	1150
1993	May 20-23	Santa Clara, CA	2055	Aug. 19-22	Minneapolis, MN	1085
1994	May 13-16	Tempe, AZ		Aug. 25-28	Buffalo, NY	
1995	May 18-21	Ft. Lauderdale, FL		Aug. 24-27	Gresham, OR	

USMS Annual Meetings and National Officers

1971	Lake Placid, NY	
1972	Kansas City, KS	Ransom Arthur P, Robert Beach VP
1973	W. Yellowstone, MT	Ransom Arthur P, Robert Beach VP
1974	Washington DC	June Krauser P, David Beardsley S
1975	New Orleans, LA	June Krauser P, David Beardsley S
1976	Phoenix, AZ	June Krauser P, David Beardsley S
1977	Columbus, OH	June Krauser P, Ted Haartz S
1978	San Antonio, TX	Ted Haartz P, Enid Uhrich S
1979	Las Vegas, NV	Ted Haartz P, Don Rankin VP, Enid Uhrich S, Reg Richardson T
1980	Snow Bird, UT	Ted Haartz P, Mike Laux VP, Enid Uhrich S, Reg Richardson T
1981	Snow Bird, UT	Ted Haartz P, Mike Laux VP, Enid Uhrich S, Reg Richardson T
1982	Memphis, TN	Mike Laux P, Verne Scott VP, Dot Donnelly S, Reg Richardson T
1983	Cincinnati, OH	Mike Laux P, Verne Scott VP, Dot Donnelly S, Reg Richardson T
1984	Indianapolis, IN	Mike Laux P, Verne Scott VP, Dot Donnelly S, Reg Richardson T
1985	Phoenix, AZ	Mike Laux P, Verne Scott VP, Dot Donnelly S, Reg Richardson T
1986	Fort Worth, TX	Tom Boak P, Gail Dummer VP, Nancy Ridout S, Kevin Kelly T
1987	Atlanta, GA	Tom Boak P, Gail Dummer VP, Nancy Ridout S, Kevin Kelly T
1988	St. Louis, MO	Tom Boak P, Gail Dummer VP, Nancy Ridout S, Kevin Kelly T
1989	Portland, OR	Tom Boak P, Gail Dummer VP, Nancy Ridout S, Kevin Kelly T
1990	Pittsburgh, PA	Dan Gruender P, Nancy Ridout VP, Mel Goldstein S, Suzanne Rague T
1991	Louisville, KY	Dan Gruender P, Nancy Ridout VP, Mel Goldstein S, Suzanne Rague T
1992	Minneapolis, MN	Dan Gruender P, Nancy Ridout VP, Mel Goldstein S, Suzanne Rague T
1993	Los Angeles, CA	Dan Gruender P, Nancy Ridout VP, Mel Goldstein S, Suzanne Rague T
1994	Kansas City, KS	

1995 Houston, TX 1996 Orlando, FL

APPENDIX G

USMS ADAPTED SWIMMING GUIDELINES

Masters Swimming welcomes adults with disabilities who share the USMS goals of fun, fitness, and competition. USMS understands that there are other sports organizations that offer swimming competition for athletes with disabilities, but also recognizes that many persons with disabilities would like to participate in Masters Swimming programs with friends from their communities. The fun and fellowship associated with Masters Swimming is enriched by the participation of adults from all walks of life.

This appendix contains information which may help Masters swimmers, clubs, and meet personnel include swimmers with disabilities in USMS programs. Additional information is available from the following USOC-member organizations:

American Athletic Association of the Deaf (AAAD) 3607 Washington Blvd. Suite #4, Ogden, UT 84403

Dwarf Athletic Association of America (DAAA) 418 Willow Way, Lewisville, TX 75067

National Handicapped Sports (NHS) (amputee sports) 451 Hungerford Drive, Suite 100, Rockville, MD 20850

National Wheelchair Athletic Association (NWAA) 3595 East Fountain Blvd., Suite L-1, Colorado Springs, CO 80910

Special Olympics International (SOI)
1350 New York Avenue NW, Suite 500, Washington DC 20005

United States Association for Blind Athletes (USABA)
33 N. Institute Street, Brown Hall, Suite 015, Colorado Springs, CO 80903

United States Cerebral Palsy Athletic Association (USCPAA) 500 South Ervay, Suite 452B, Dallas, TX 75201

Disabilities

For purposes of this appendix, the term "disability" refers to a condition which limits an individual's ability to perform starts, strokes, or turns according to USMS rules. Disabilities which affect adults include, but are not limited to, physical impairments such as cerebral palsy, spinal cord injuries, amputations, multiple sclerosis, and rheumatoid arthritis; sensory impairments such as hearing loss, deafness, visual impairments, and blindness; learning difficulties such as mental retardation; and health conditions such as cancer or severe asthma. Temporary conditions such as pregnancy or injuries such as tendinitis should not be considered disabilities. In general, the Referee should accept a swimmer's self-identification that he/she has a disability.

USMS Policies on Adapted Swimming

- USMS actively encourages adults with disabilities to participate in Masters Swimming training programs, competition, and other activities.
- * Because it is important to the personal success of a swimmer with a disability to perform within the rules as much as possible, and because it is impossible to legislate rule changes to accommodate the unique needs of all swimmers with disabilities who participate in USMS competition, no specific rule changes shall be adopted to accommodate swimmers with disabilities.
- * Meet officials are allowed flexibility to interpret USMS swimming rules as needed to accommodate swimmers with disabilities. This appendix includes guidelines to aid meet officials in interpretation of rules.
- * Masters Swimming clubs and swimming meet officials are encouraged to use pools which are accessible to swimmers with disabilities for both training and competition, to remove barriers to accessibility, and to describe the accessibility of parking, locker room, and swimming pool facilities in meet announcements.
- * Meet officials are encouraged to request in meet announcements that swimmers with disabilities describe any special requirements for their participation in Masters Swimming meets before the first day of the meet.

Swimming Meet Guidelines

Rule Interpretations. According to Article 103.1.6, the Referee may modify swimming rules to accommodate swimmers with disabilities. Such modifications may be needed to ensure that no swimmer (including the swimmer with a disability) obtains unfair advantage over other competitors and to insure the safety of the swimmer.

The "unfair advantage" principle should be especially helpful to the Referee. For example, consider an individual who has limited functional use of the legs who enters a breaststroke event. If the swimmer cannot perform propulsive movements of the legs (but can maintain a legal body position and perform a legal arm stroke), he should not be disqualified because he has not obtained an unfair advantage. The

Page 146 Appendix G

same swimmer should be disqualified if he uses an illegal, but propulsive, kicking action, because he is gaining an unfair advantage over swimmers who are not allowed to use the illegal kicking action.

Although it is impossible to suggest rule modifications that are appropriate for every swimmer with a disability, the following suggestions may be used as guidelines in rule interpretations:

Start: Masters Swimming rules permit the forward start to be taken from the starting block, the pool deck, or a push from the wall. Examples of possible modifications to the start rule may include using a strobe light or other visual stimulus for a swimmer with hearing impairment, or using a beeper or whistle start for a swimmer who may overreact to a gun start.

Relay Starts: Potential modifications include (a) permitting swimmers to begin subsequent relay legs from the optional deck or water start positions, which may require turning off electronic timing equipment in that lane after the start and until the last swimmer finishes, and (b) warning a swimmer with visual impairment when to dive with a verbal command and/or a tap on the heel.

Turns: Examples of rule interpretations include using a "bonker" (a soft ball at the end of a pole) to warn a swimmer with visual impairment of the end of the pool, or judging a swimmer with a physical disability based upon functional body parts. For example, a swimmer with only one arm or who is paralyzed on one side of the body should be judged based upon hand instead of hands, and arm instead of arms. Similarly, the stroke initiated upon leaving the wall should be judged in terms of the body extremities which are capable of performing the required movements.

Strokes: Rule interpretations should be concerned with the body extremities which are capable of performing the required movements. Flotation devices are not allowed in competition. A band placed around paralyzed limbs is acceptable.

Responsibilities of the Swimmer. The primary responsibility of the swimmer is communication. Article 103.1.6 requires the swimmer or his representative to notify the Referee of his disability before competing. The swimmer with a disability is encouraged to inform the host club in advance of any special needs related to his participation in the meet, and ask a teammate or friend for personal assistance at the meet if necessary.

Responsibilities of the Host Club. USMS has adopted two accessibility policies which serve as guidelines to the club or facility hosting a Masters Swimming competition. These policies emphasize using accessible facilities when possible, working to remove barriers to accessibility, describing the accessibility of facilities in meet announcements, and cooperating with swimmers who have disabilities regarding their participation in competition.

Preparation of the Facility. Masters Swimming rules require that meet directors investigate the use of appropriate emergency medical equipment and

personnel for all meets. Meet directors should become familiar with the emergency action plan in effect at the meet facility. Specific preparations for competitors who have disabilities will depend in large part upon the information provided by the individual swimmer. Some suggestions include:

- For swimmers with visual impairments, remove all hazards and nonessential
 equipment from the pool deck, either close or open all doors (be consistent!),
 and ask the swimmer to bring a friend to assist him around the facility.
- For swimmers with hearing impairments, have a chalkboard on hand to indicate progress of the meet and use signs to indicate the location of meet officials and facilities.
- * For swimmers with physical impairments: (a) keep locker room and deck areas clear to enable easier access by wheelchair users, (b) place wheelchairs, crutches, or canes behind the timers during competition and return personal equipment to the swimmer after the race, and (c) assist the swimmer in and out of the water if necessary (ask the swimmer for instructions about the safest and most efficient way to assist).

Responsibilities of Meet Officials. The primary responsibilities of meet officials are to ensure fair competition and to time, judge, and record the results of that competition accurately. The responsibilities of meet officials do not change when athletes with disabilities are included in the competition.

Although the athlete with a disability may have some special requirements for his participation (e.g., help transferring from a wheelchair to the pool, amplification of an auditory starting device, or use of a visual starting signal in addition to an auditory signal), most persons with disabilities do not want to be treated differently. Do not seed athletes with disabilities in special (outside) lanes unless indicated by safety considerations. Do not observe their swims more closely or less closely than other swimmers in the heat. Do use common sense. Allow a little extra time between heats to permit safe entry and egress from the pool. Be certain that swimmers with hearing impairments are aware of your verbal instructions. If unsure whether a swimmer with a disability needs assistance, ask the swimmer.

There are few canyons
like the Grand Canyon...
few mountains
like the Superstition Mountains...
few towns
like Old Towne Tempe...
and few swims
like a cool fast desert swim.



May 13-16 • Tempe, AZ

USMS National Short Course Championships
PO Box 27523 • Tempe, Arizona 85282
(602) 902-0431

TRADITION & INNOVATION

1-800-685-6988

diello



SUIT UP WITH A WINNER!



PowerBar Wolfin

Specializing in Team Business . . . since 1978
For your Swimming, Diving, Triathlon, Water Polo, Synchro & Masters teams

CALL TOLL FREE **1-800-547-2520**

CALL FOR CATALOGS AND INFORMATION ON TEAM SUITS WITH NO MINIMUMS REQUIRED

3139 Pacific Avenue 503-359-4779

Forest Grove, OR 97116 FAX 503-357-1263

Ponte Vedra Travel

& Associates

An Official Travel Agent of USMS

Masters Swimming Favorite Travel Agency

1-800 833-SWIM

1994-95 will be another great year for swim travel. Ponte Vedra Travel has travel packages for many exciting International Swimming Championships:

Rendez-Vous 94 Montreal Vth World Masters Swimming Championships July 3-10, 1994

Barbados International Swimming Championships Barbados, West Indies September 27-October 3, 1994

Pan Pacific Masters Swimming Championships Perth, Australia 1995

Ponte Vedra Travel & Associates is an official travel agency of the USMS and the favorite travel agency of Masters Swimmers. Join us, George Koski, Margaret Samson and Shannon Sullivan, the Associates, for one or more of these great International Swimming Championships.

Write or Call

Ponte Vedra Travel

2280 South Third Street, Jacksonville Beach, Florida 32250 Phone: **1 800 833-SWIM** Fax: 1 904 241-4206

LOW PRICES • SERVING YOU SINCE 1975 • NO DIE CHARGE CUSTOM MADE MEDALS, PINS, MEDALLIONS & PATCHES.

Custom Cloisonne Medals



Die Struck Medallions



Custom Pins, Charms, Patches



All Custom Pieces: NO DIE CHARGES! • High quality • Your design—any colors, shapes, sizes plus your choice of ribbon, chain, neck ribbon or key ring • Min order only 250 pcs • 8 week delivery • Send sketch or fax today

Phone & Fax Order Lines: CA: (714) 492-4155 • USA: (800) 421-6735 • Fax: (714) 492-4158



Stock Medals

Immediate delivery on these rich multi-colored, hard enamel, die struck medals Ribbon included Gold, silver or bronze finish, carded and packaged Only \$1 25 each



Emblematics, Inc.

944 Calle Amanecer, Suite F • Dept. MS P.O.B. 72005 • San Clemente, Calif. 92674

PUTONA SUIT AND GO TO WORK.



Thank You Masters Swimmers

The International Swimming Hall of Fame has been fortunate to have the support of literally hundreds of masters swimmers throughout the past. This continuing assistance has helped to provide you with the world's most complete aquatic complex, state-of- the-art museum and library.

ISHOF appreciates all who have permanently placed their name or names of their loved ones on our 'Wall and Walk of Fame.'



Sample - Masters Wall

BILL LASWELL
BILL LASHER
JANET LARSON
R. L. LANDERS
JUNE KRAUSER
BOB KRAMM
MARK KOPLIN

Sample - Walkway

It's easy! Simply send your check or credit card information (VISA, MASTERCARD, or AM. EXPRESS) to ISHOF, One Hall of Fame Drive, Ft. Lauderdale, FL 33316 (305) 462-6536 Fax (305) 525-4031.

Please specify one of the following whe	en placing your order:
Masters Wall / \$100	Walkway with name imprinted \$200
Champions Wall / \$100 (National or World)	SHOF

Name as you wish it to appear on wall or walkway

Memorabilia Items Wanted!

Museum _

One year ago the International Swimming Hall of Fame opened the doors of its new exhibition building. We are now in the process of updating and changing our displays. To help tell the history of the aquatic sports, we ask you to take a look at your memorabilia items, photos, materials, etc. that you would like to donate to the Hall of Fame, in order to help us accomplish this goal. Please contact Bob Duenkel, Curator, for any questions. (305) 462-6536.

Library___

The Henning Library located at the International Swimming Hall of Fame, currently has the largest digital computer image collection in North America, the world's largest aquatic sports holdings collection (i.e. 235 images/89,789,076 bytes), and now has the state-of-the-art means to organize and communicate information.

The library staff is designing, capturing, storing, and retrieving "Image-Power" items (i.e. text, pictures, medals, trophies, statues, and live-action shots).

Consequently, The Henning is prepared to receive contributions of any book, periodical, film or video materials. Please consider donating both old and new items as the collection, though of considerable breadth and depth, is not comprehensive. Your gift may be eligible as a "non-cash charitable contribution."

Please contact Preston or Rita Levi with any questions regarding donations or US tax information. ISHOF, One Hall of Fame Drive, Ft. Lauderdale, FL 33316, (305) 462-6536 Fax (305) 525-4031.



COMPETITIVE AQUATIC SUPPLY SWIMWEAR

TRAINING & SWIM AIDS

SPEEDO°

ACCESSORIES

CAPS

GOGGLES



BAGS, HATS, & TOWELS

POOL SHOES

STOPWATCHES

LANE LINE & LANE LINE PARTS

CLOCK & CLOCK PARTS





FLUID REPLACEMENT & ENERGY DRINKS

ONE STOP SHOPPING

COMPETITITIVE AQUATIC SUPPLY

15131 TRITON LANE #116

HUNTINGTON BEACH, CA 92649

IN CALIFORNIA: (714) 898-2655 or (310) 633-3333

FAX: (714) 898-4988

TOLL-FREE NATIONWIDE: 1-800-421-5192

A NEW VIDEO

From **Dr. Marty Hull**, inventor of Zoomers[™] High Speed Training Fins

WATER

HOW TO:

- be safe in it
- have fun in it
- move powerfully in it
- swim fast in it

TO HELP YOU UNDERSTAND SWIMMING

INCLUDES:

- Discussions of concepts about how swimming works, beginning with simple ideas and progressing to the more complex.
- A sequence of drills and techniques you can learn and practice one at a time which will build the skills you need to give you better control in the water and allow you to swim much more effectively.
- Also includes applications of Zoomers fins to help you learn much faster.

For information and ordering: call 800-852-2909

54 minutes \$24.95 includes shipping and handling, California state sales tax not included.



AT ERIE COMMUNITY COLLEGE NATATORIUM DOWNTOWN, BUFFALO, NY

POOL OPENED IN JULY 1993 for WORLD UNIVERSITY GAMES

Shuffle off to Buffalo!

Sanctioned by Niagara District Masters Swimming

Gene Donner

4220 South Park Ave Blasdell, NY 14219 716/823-3873•823-8556Fax

Meet Directors George McVey

477 Antiers Drive Rochester, NY 14618 716/271-2323

Betty Barry

1403 Victor-Holcomb Road Victor, NY 14564 716/924-5344

Does your awards supplier...

- Offer custom packing at no charge?
- Have two factories for *guaranteed*, on time delivery?
- Consider "on time" to be when you want it, not when they see fit to deliver?
- Have a catalog specially designed for athletics?
- Have ten account managers to help you?
- Have a computer monitoring system to watch delivery dates?
- Accommodate your last minute rush orders without fanfare?
- Save you money with a toll free telephone and fax number?
- Guarantee your satisfaction?

If not, call us....because we do!

Hodges Badge Company, Inc.

Quality ribbons, rosettes, medals, and buttons since 1920.

CALL FOR YOUR FREE 20 PAGE CATALOG!

Sales Office PO Box 4709 Middletown, RI 02842 800-556-2440 Fax 800-292-7377 In RI 401-847-2000



JOIN TEAM MASTERS USA AND WIN A FREE TRIP TO THE WORLD SWIMMING CHAMPIONSHIPS IN MONTREAL, CANADA.

Swim in any local 1994 USMS short course yards meet (between January 1st and May 16th) and enter your times in the Team Masters USA Postal Challenge. This unique handicapped postal event determines your national ranking against men and women of all age groups.

The Team Masters USA Handicap Formula

Team Masters USA scoring is handicapped by comparing your entered times in the specified combination of events against your age-group national records (as of 9/1/93) in those events. Handicap scores rank you within age-group and against all participants.

Awards for everyone!

Team Masters USA participants will receive a t-shirt, cap, event certificate and program with comprehensive listing of national and age-group scores and rankings. Participants will also be eligible for:

- ★ The 8 winners of the national races win a free trip to the Masters World Championships in Montreal, Canada on July 4-11, 1994.
- ★ Custom medals, ribbons and other product awards for the age-group winners (1st-10th) in each of the national races.
- ★ Team points awarded to the top 100 in each of 8 national races. The winning team's coach receives a free trip to Montreal as coach of Team Masters USA

For meet entry form write, phone or fax:

Team Masters USA

520 Broadway, Suite 310, Santa Monica, CA 90401 Tel: (310) 451-6666 Fax: (310) 576-0962

TEAM MASTERS USA



9119 D Executive Park Dr Knoxville, TN 37923

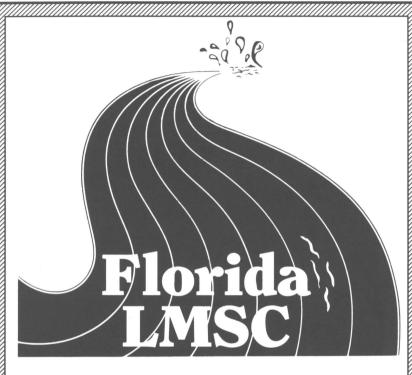
> 1-800-545-7999 FAX 1-615-531-0829



Good Luck To All Swimmers!

Call Us If We Can Help With Any Of Your
Swimming Needs!

SWIFTSKIP. 1-800-341-0246 675 Forest Ave Portland, ME 04103	TEAM BAGS
ADDRESS	\$29.50 ea. + \$4.00 shipping
SHIPPING \$4,00 TOTAL	Please include your team logo or a description of how your would like your bag printed.



JOHN P. MAGUIRE

Chairman

4033 12th STREET N.E. ST. PETERSBURG, FLORIDA 33703 813-823-7116

MEEGAN J. WILSON

Secretary

620 N.W. 27th WAY GAINESVILLE, FLORIDA 32607 904-373-0023

DICK AVERY

Treasurer

1111 CHERRY HILL DRIVE SUN CITY CENTER, FLORIDA 33573 813-633-3970

BILL UHRICH

Sanctions

1509 BUNKER HILL DRIVE SUN CITY CENTER, FLORIDA 33573 813-634-7564

CHARLES H. KOHNKEN

Registration

1258 FLUSHING AVENUE CLEARWATER, FLORIDA 34624 813-531-0008

CATHERINE COOPER

Records

9775 S.W. 52nd ROAD GAINESVILLE, FLORIDA 32608 904-336-9027 (unlisted)

FRANK TILLOTSON

Newsletter Editor

2494 13th AVENUE N., #46 ST. PETERSBURG, FLORIDA 33713 813-327-1492



PARAGON

These are the finest, most beautiful take-off platforms made for recreational pools. Preferred by coaches and swimmers worldwide, they are available in 32 styles (including removable models) to fit every pool profile and budget. Harmonizes with our renowned line of guard chairs and diving stands for a total pool look—why settle for less? *Catalog on Request.*



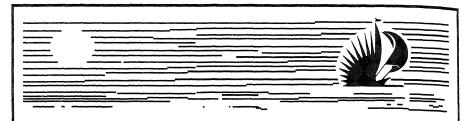
KDI PARAGON INC. PO Box 256, Pleasantville,

NY 10570. Tel: 914/769-6221

Fax: 914/ 769-0670



PLATFORMS



The International Swimming Hall of Fame Aquatic Complex

- Fort Lauderdale, Florida

Proud Host of

1995 USMS National Short Course Championships May 18-21

1995 USMS 3.5 - 5 Mile Open Water Championships May 22

Call (305) 468-1580 for information on training vacations and upcoming meets

Hamburg Offset Printing Inc. 5738 SOUTH PARK AVE HAMBURG, NY 14075 1716/648-0390 716/648-0393 FAX

Complete Printing Services for BUSINESS & MARKETING

to to to

Talk to Gene Donner at716/823-3873 about

MEDICAL FORMS ANNUAL REPORTS CONTINUOUS LABELS **BUSINESS FORMS FLYERS** STATIONERY **FOLDERS Business Cards** Letterhead BROCHURES Envelopes MARKETING SHEETS **NEWSLETTERS BOOKS** COUPON BOOKS

POSTERS

SOUTHTOWN BUSINESS FORMS



Design a great medal, at a great price.

You may not realize that custom medals are very affordable.

At Maxwell Marketing, we have been providing custom-designed medals for over fifteen years at prices that compete with traditional stock medals.

And, we simplify the creative process making it easy to order!

Just send us a rough sketch or a photocopy of a design you like and we'll do the rest. Our art department

will have a medal design back to you within 48 hours.

Call us today for a complimentary sample medal and a free catalog.

1-800-331-1383





In a rush? Short on time? Call us about our EXPRESS MEDALS. Available in three finishes and in-stock!

Ad hoc committees 86	turns 17
Ad hoc officials committee 134	Board of directors 80
Ad hoc recogniton and awards	meetings 81
committee 134	membership 80
Adapted swimming 144	requirements 81
officiating 30	powers 81
responsibilities	quorum 81
host club 146	term 81
officials 147	vacancies 81
swimmer 146	voting privileges 81
rule interpretations 145	Breaststroke 16
USMS policies 145	finish 16
Addresses 135	kick 16
Administrative regulations 59	start 16
Age groups 20	stroke 16
individual events 20	turns 16
long distance 69	Bulkhead 53, 54
relay events 20	Butterfly 16
All-American 50, 52	finish 17
long distance 73	kick 17, 117
Amendments	
adoption 89	start 16
effective date 89	stroke 17, 117 turns 17
emergency 89 modification 88	Bylaws 77
procedures 88	Championship committee 82, 132 Clerk of course 24
	duties 40
proposed 88	
submission 88 USS 89	Club 12
	Coach-of-the-year award 141
Announcer	Coaches committee 82, 132
duties 40	Committees 81
Annual meeting	ad hoc 86
history 143	ad hoc officials 134
Appeals 74	ad hoc recognition and awards 134
Athlete	championship 82, 132
membership 59	coaches 82, 132
registration 59	convention 82, 132
representation 59	executive 81, 130
Athletes' rights 74	finance 82, 132
denial of 74	fitness 83, 132
investigation 74	insurance 83, 132
executive secretary 74	internal audit 83, 132
review section 74	international 84, 133
protection 74	jurisdiction 88
reporting 74	legislation 84, 133
review section	long distance 84, 133
composition 74	marketing/publications 84, 133
Awards 26	planning 84, 133
nat. long dist. champ. 72	records and tabulation 85, 133
national championships 49	registration 85, 134
ties 26	rule book 85, 134
Backstroke 17	rules 85, 134
finish 17	sports medicine, health and safety
flags 56	85, 134
lines 57	standing 82
start 17	zone 85, 134
starting grips 56	Conduct
stroke 17, 117	national championships 43

Page 168 Index

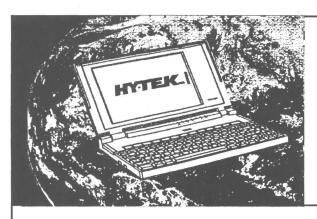
Controller 80, 86, 135	long distance 68
Convention committee 82, 132	Fitness committee 83, 132
Costume 27	Freestyle 17
advertising 27	finish 18
design 27	start 17
long distance 68, 118	stroke 18
nat. long dist. champ. 71	turns 18
Counters 22, 25	Glossary 12
Deck equipment 55	Goals and objectives 11
Delay	Health and Safety
deliberate 32	regulations 52
Directory 130	Hearings 74
Disabilities 144, 145	appeal procedures 76
Disqualifications 27	formal 75
deliberate delay 32	procedures 75
infraction signal 34	Heat sheets
long distance 69	national championships 44
misconduct 32	
	Historian 135
relays 19	History 141
Dissolution 87	House of delegates 78
Diving boards 55	meetings 79
Dual meet 12	membership 78
Eligibility 19, 118	powers 78
Entry	quorum 79
deadline	voting 79
national championships 47	Indemnification 87
fees	Individual medley 18
nat. long dist. champ. 71	finish 18
national championships 47	start 18
form	stroke 18
nat. long dist. champ. 71	turns 18
national championships 46	Infraction signal 34
Entry fees 21	Insurance committee 83, 132
Equal opportunity 74, 77	Internal audit committee 80, 83, 132
Events 20	International committee 84, 133
cancellation 27	ISHOF liaison 135
limit 21	Judges 33
national championships 45	chief 33
long course 21	relay take-off 33
long distance 63	stroke 33
postal 65	jurisdiction 33
time/distance 64	turn 33
short course meters 21	jurisdiction 33
short course yards 20	Ladders 55
Executive committee 81, 88, 130	Lane
Facilities	assignments 22
national championships 50	lines 56
standards 53	numbers 54, 56
False start 31	Legal counsel 80
recall rope 57	Legislation
Fees 87	changes 88
FINA representative 135	committee 84, 88, 133
Finance committee 80, 82, 132	Liability release 62
Finances	long distance 63
fiscal year 86	Liaisons 135
nat. long dist. champ. 71	Lighting
	national championships 55
policy 86	Local masters swim committee 77

abbreviations 125	entry procedures 46
annual meeting 77	evaluation 43
annual reports 78	event limit 45
boundaries 78, 125, 127	facilities 50
bylaws 77	format rotation 45
chairmen 130	general meeting 43
map 126	heat sheets 44
membership 77	history 142
numeric codes 125	lighting 55
officers 77	long distance 69
Long distance 63, 118	officials 50
administration 63	personnel 50
all-American 73	program 44
committee 84, 88, 133	protest 49
costume 118	qualifying times 20, 45
events 63	report 43
national championships 69	results 49
awards 72	rotation system 41
club scoring 72	schedule 123
eligibility 69	scoring 48
entry fees 71	seeding 47
events 69	time standards 45
results 72	warm-up 44
schedule 123	National records 51
site selection 70	Nominations 86
organization 63	Officers
records 73	local masters swim committee 77
relays 66	USMS 79
rules changes 88	duties 79
safety 66	elections 79
starts 67	history 143
Marketing/publications committee 84,	president 79
133	secretary 80
Marshals	term 79
duties 40	treasurer 80
Medical	vacancies 79
equipment 53	vice-president 80
examination 52	Official time 37, 39
Meet	records 39
committee 29	Top Ten 39
director 29, 116	world records 40
Membership 59, 77	Officials 30, 117
categories 77	announcer 40
mandatory 77	certified 29, 50
Misconduct 32	clerk of course 40
Mission statement 11	duties 30
MSI representative 135	judges 33
National championships 41	long distance 68
awarding 41	marshals 40
awards 49	minimum 29
bidding procedures 42	nat. long dist. champ. 71
categories 41	press steward 41
	recall rope operator 33
conduct of meet 43	recall starter 33
contract 43	recall starter 33
director 50	recorder 35 recorder of records 40
entry deadline 47	
entry fees 47	referee 30
entry form 46	relay take-off judges 33

Page 170 Index

required 29	world 52, 119
starter 31	Records and tabulation committee 85,
timers 34	133
Officiating equipment	Referee
automatic 57	duties 30
display board 58	Registration
national championships 50	athlete 59
touch pads 58	committee 85, 134
Open competition 13	fee 59
Open water (see Long distance), 64	forms 59
Pace clocks 57	liability release 59
Parliamentarian 135	long distance 63
Places 25	Relays 18, 21
Planning committee 84, 133	cards 21
Pool	disqualifications 19
bottom lane markers 54	exit from water 117
end wall targets 54	freestyle 18
length 53 certification form 121	long distance 66
walls 54	medley 18
width 53	mixed 19
Preamble 11	rules 19
Press steward	Representation
duties 41	athlete 59 unattached 60
Program	D 14 -
change 26	meet 116
postponement 26	nat. long dist. champ. 72
Protest 28	national championships 49
national championships 49	Review section 74
Qualifying times 20, 45	authority 75
Quorum	composition 74
house of delegates 79	jurisdiction 75
Racing course	procedures 75
dimensions 53	Rule book committee 85, 134
ladders 55	Rules
lighting 55	changes 88, 89
markings 54	committee 85, 88, 134
recirculation system 54	Safety
walls 54	electrical 58
water depth 54	long distance 66
Ransom Arthur award 141	regulations 52
Recall rope operator 33	Sanctions 13, 60
Recall starter	denial 61
duties 33	long distance 63
Recognitions 60	requirements 60
denial 62	transfer 61
foreign events 62	Scoring 26
requirements 61	club
Recognized meet 13	nat. long dist. champ. 72
Record keeping 78 Recorder 35	disqualifications 26 dual meets 26
Recorder of records	
duties 40	national championships 48 other meets 26
Records 50, 91, 118	ties 26
applications 119	triangular meets 26
long distance 73, 119	Scratches 21, 118
national 51	penalties 21
requirements 50, 119	Seeding 22, 118
10401101110 00, 110	Cooding EE, 110

50-meter course 23 distance events 23 long distance 67 national championships 47 principles 22 two-to-a-lane 23 etiquette 24 methods 24	USAS representative 135 USMS national conventions 123 USS liaison 135 Warm-up/warm-down availability 20, 118 national championships 44 procedure 20
timing 24	Warning signal 31
Smoking 30, 55	Water
Sports medicine, health and safety	depth 53
committee 85, 134	temperature 55
Standing committees 82	World records 52 YMCA liaison 135
Start backstroke 15, 117	Zone 14
false starts 31	boundaries 125
forward 15, 117	committee 85, 134
long distance 67	map 126
Starter	representatives 130
duties 31	10p1000manvoo 100
recall 33	
Starting	
commands 31	
loudspeaker system 57	
platform 55	
Swim magazine editor 135	
Time	
determination 37	
official 37, 39	
standards 45	
Timed finals 118	
Timers	
chief 34	
duties 34	
head lane 34	
judge 35	
lane 34	
Timing accuracy 37	
adjustment 37	
automatic 36	
equipment 36	
automatic 36	
semi-automatic 36	
equipment operator 35	
heat malfunction 38	
lane malfunction 37	
manual 36	
primary system 36	
malfunction 37	
resolution 37	
secondary system 36	
systems 36	
tertiary system 36	
Top Ten times 50, 51	
requirements 50	
Travel permits 60	
Unattached 14, 60	



FY - FK

The Sports Software People!

Software Written for Swimming People!

Thank You <u>USMS</u> for making Hy-Tek Your #1 Choice for Computer Software.

TEAM MANAGER: Team rosters, attendance lists, best times, meet entries, records, Top 10, etc.

MEET MANAGER: Most popular meet management software - runs Masters meets - connects to any timing console.

COMMLINK: Move meet entries/results between MM and TM as well as check registration compliance before the meet.

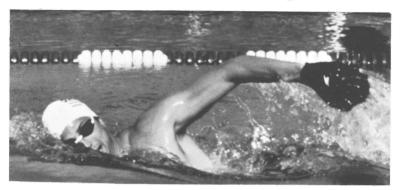
BUSINESS MANAGER: Team billing and invoicing.

Call for FREE DEMO

Call: (919) 633-5111

Fax: (919) 633-5122

Pull it all together at Kast-A-Way.



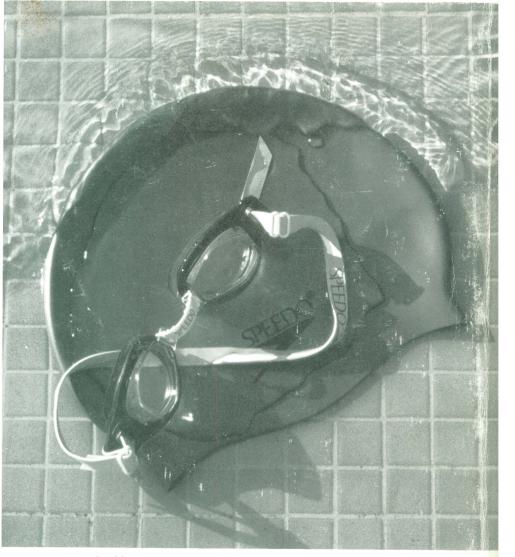
caps • parkas • bags • polo shirts and other products featuring the USMS logo are available through Kast-A-Way!

We also carry training equipment, books, deck sandals, swimmer's chamois and more.

To place your order or to receive our free 48-page catalog, call 1-800-543-2763

KAST-A-WAY SWIMWEAR, INC.





The stuff that great swimmers are made of.





Exclusive supplier of deck apparel to the U.S. National Swim Teams (1985-92)
Speedo® America. Van Nuys. CA. Call 1-800-547-8770
Speedo® registered trademark of and used under license from Speedo Holdings B.V.