

WORKSHOP PROGRAM

LARVAL BIOLOGY WORKSHOP

(Tuesday 20 August 1991)

(Convener: Dr Iain Suthers, University of NSW)

- 0900-0915 Introduction - Dr John Glaister, President, ASFB
- 0915-1000 Keynote Address - Dr Rob Murdoch, N.Z. Oceanographic Institute "A review of the ecology of hoki, *Macruronus novaezelandiae* (Hector) larvae in New Zealand waters"
- 1000-1030 "Ichthyoplankton studies for fisheries research" - Dr John Zeldis, MAFFish, Wellington, New Zealand (presented by Dr Don Robertson).

1030-1100 Morning Tea

1100-1230 **SESSION 1 FEEDING ECOLOGY AND CONDITION OF LARVAE**

Chairperson: Greg Jenkins, University of Melbourne and VIMS, VIC

Rapporteurs: Helen May, Bryce Stewart

Panel Speakers:

Jock Young, CSIRO Fisheries, TAS "Feeding ecology of marine fish larvae: an Australian perspective".

Daniel Gaughan, Murdoch University WA "Feeding by estuarine and marine fish larvae".

Nigel Preston, CSIRO Fisheries, QLD "*In situ* rearing of prawn larvae - testing the starvation hypothesis".

Greg Jenkins, University of Melbourne & VIMS, VIC "What can growth trajectory tell us about the nutritional state of fish larvae?"

Iain Suthers, University of NSW "The use of condition indices in larval fish".

Maria Milicich, Australian Institute of Marine Science, QLD "Do fish otoliths really record change in somatic growth rate?"

1230-1330 Lunch

1330-1500 **SESSION 2 EXTENSIVE LARVAL REARING**

Chairperson: Stephen Battaglione, NSW Ag. & Fish.

Rapporteurs: Cathy Hair, Charles Gray

Panel Speakers:

Stephen Thurstan, NSW Ag. & Fish. "Commercial extensive larval rearing of Australian freshwater native fish" (presented by Paul Brown).

John Burke, Fisheries Division, QLD "The effect of salinity in the extensive rearing of Australian bass *Macquaria novemaculeata*".

Bill Talbot & Stephen Battaglene, NSW Ag. & Fish. "The effect of temperature in the extensive rearing of Australian bass, *Macquaria novemaculeata*" (Steindachner).

Peter Gehrke, Inland Fisheries Research, NSW "Implications of water quality for larval fish metabolism, activity and growth in extensive rearing conditions."

Martin Daintith, University of Tasmania, TAS "Comparison of intensive and extensive culture of the Tasmanian whitebait *Lovettia sealii*" (Johnston).

Frances Ruwald, Sea Fisheries, TAS. "Larval feeding trials with the striped trumpeter *Latris lineata*".

1500-1525 Afternoon Tea

1525-1645 **SESSION 3 BIOLOGICAL EFFECTS OF OCEANOGRAPHIC PROCESSES**

Chairperson: Iain Suthers, University of NSW

Rapporteurs: Frances Laurenson, Linda Worland

Panel Speakers:

Simon Thorrold and David McKinnon, Australian Institute of Marine Science, QLD "Biological significance of the coastal boundary layer off Townsville, North Queensland."

Aldo Steffe and Mark Westoby, Ecology Lab. Pty Ltd and Macquarie University, NSW "Tidal currents, eddies and orientated behaviours by larval fishes."

Alan Jordan, Sea Fisheries, TAS "Interannual variability in the oceanography of the east coast of Tasmania and its effects on jack mackerel (*Trachurus declivis*) larvae."

Barry Bruce and David Short, SA Fisheries "Observations on the distribution of larval fish in relation to a frontal zone at the mouth of Spencer Gulf, South Australia."

John Booth and Robert Stewart, MAF, NZ "Distribution of phyllosoma larvae of the red rock lobster *Jasus edwardsii* off the east coast of New Zealand in relation to the oceanography."

1645-1715 **GENERAL DISCUSSION AND SUMMING UP**

Chairperson: John Gunn, CSIRO, Hobart

Rapporteurs: Frances Laurenson, Linda Worland

Panellists: Keynote Speakers and Session Chairpersons

1715-1745 Summing Up: Dr Jeff Leis, Australian Museum, NSW

EVENING SESSION: TAXONOMY OF TEMPERATE AUSTRALASIAN FISH LARVAE

Chairpersons: Tony Miskiewicz, Water Board and Pancho Niero, Murdoch University

Rapporteur: Tony Miskiewicz

Contributors: Barry Bruce, Tom Trnski, Aldo Steffe, Greg Jenkins, Dianne Furlani, Frances Laurenson, Alan Jordon, Charles Gray

(Evening workshop for larval fish taxonomists to generate a preliminary guide to families of temperate larvae, a list of names of relevant Australasian workers, and some figures/descriptions of larvae from workers prepared to publish in the Workshop Proceedings. This will continue into a hands-on session with microscopes and specimens on Friday. Chairpersons will present a paper at the ASFB conference summarising their findings.)

Friday, 23 August 1991 - is a lay-day to recharge the batteries for the Annual Conference. For the enthusiasts, there will be a Larval Fish Drawing Techniques Workshop, convened by Iain Suthers and Jeff Leis, 1400 - 1700.

(Many budding larval fish taxonomists have difficulty in accurately drawing larvae for publication, requiring not only camera lucida techniques, but also requires myomere and fin ray counts. This informal workshop will go over these techniques, but with only 3-6 microscopes, group size may have to be limited.)