The RAM II stock-recruitment database

An historical and technological overview

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RAM's original database

- A lifelong endeavour that started when RAM worked at DFO
- First summarised in a technical report and resulted in numerous publications
- Focused on:
 - Meta-analytic methods to draw strength from many stocks
 - The relationship between spawning stock and recruitment
 - Maximum reproductive rate at low spawning stocks
- Housed in flat text files

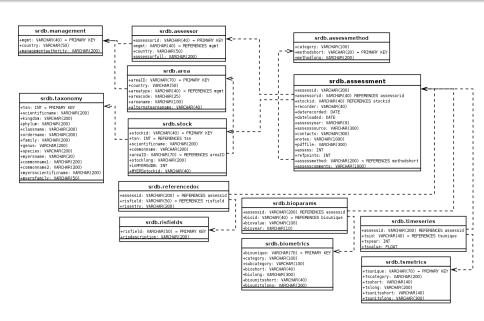
Archived on server (i.e not updated anymore) and available from the following URL:

http://chase.mathstat.dal.ca/~myers/welcome.html

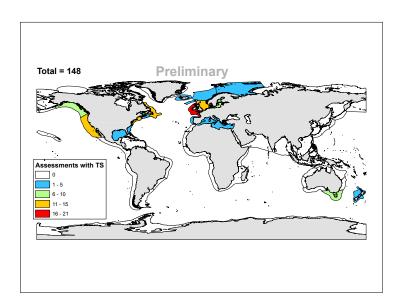
RAM II database - srdb

- A user-built database
- A relational database using the Open Source postgreSQL RDBMS with postGIS
- Internet accessible (TCP/IP), concurrent users, privileges and credentials
- Data from individual assessments are captured in a standardised spreadsheet file
- Suite of Open Source tools used for development (BASH, Perl, LaTeX, R, Python)

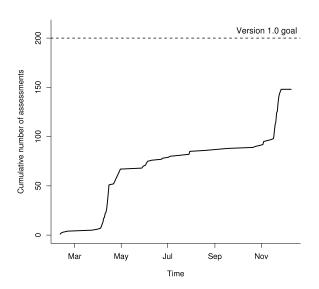
Database structure - Entity relationship diagram



Geographic coverage



Entered assessments



Demo session

RAMlegacy portal:

http://www.marinebiodiversity.ca/RAMlegacy

How to:

- Submit an assessment
- 2 Track assessment progress
- Connect to the database on
 - development server
- Get the timeseries data
- QCQA plot

Release of srdb version 1.0

Points to consider before wide distribution and usage:

- How to make this data authoritative? QC/QA
- How to make this data citable? Metadata and summary publication
- How to make analyses reproducible? Versioning of database content
- How to ensure usability? Documentation, tailored database views as products

Complete entry of top-twenty tonnage fisheries

Anticipated formal release: March 2009

Longterm plans

- Addition of stocks from other areas (Africa, South America, Asia),
- Addition of new species (salmonids, freshwater fishes, invertebrates)
- Addition of ancillary data (management, economic, life history data....)
- Engage with regional fisheries agencies for timely inclusion of new assessments
- Develop a web-based interface for querying the database

Acknowledgments

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