Status of Implementing ATC Method 3 at NCIC CTG

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Overview

- NCIC CTG Data Warehouse Goals
- Progress & Challenges since last ATC meeting
- MA.20 Accrual
- MA.20 Goals for next 6 months
- ROQAC Vision
- Summary and Conclusions
- Questions for ATC
- Questions

Goals of NCIC CTG Data Warehouse

- Use internet technology to facilitate
  - Rapid real-time reviews for MA.20
  - Distributed review of clinical trials
- Minimize impact on central office staff
- Minimize technical expertise required by end user
- Extend solution to support Dicom-RT data objects for 3D-CRT and IMRT protocols

Progress (since Jan-05 ATC meeting)

- Meetings
  - Weekly ROQAC MA.20
  - Every 6th week ROQAC
  - Semi-annual NCIC CTG
  - Conference calls with RCET & ATC as needed
- Completed testing of NCIC CTG Test Server
- Moved software to Production Server for user testing
- User Documentation completed
  - MA.20 submission manual
  - MA.20 reviewers manual
  - NetSys Installation and configuration manual
  - FAQ
- Released NCIC CTG Data Warehouse for MA.20 clinical use May 30, 2005 (letter)
  - Please excuse our oversight for not explicitly thanking RCET, ATC and NCI-US.

Progress cont'd (as of June 21, 2005)

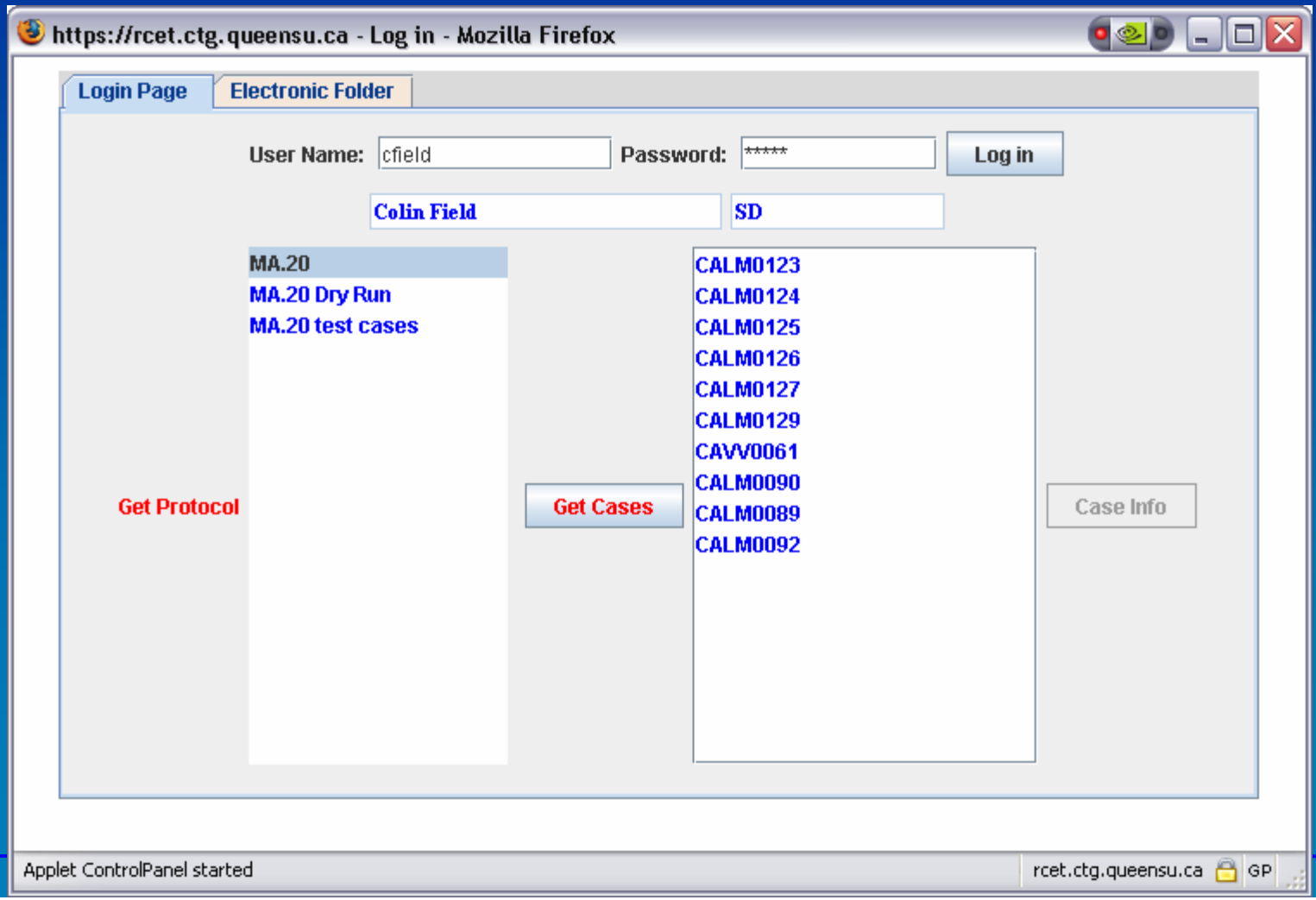
- All MA.20 centres to be re-credentialed
- 3 credentialed institutions
  - Vancouver Island Cancer Centre
  - Juravinski Cancer Centre
  - Tom Baker Cancer Centre
- 5 Dry Runs in progress
  - Cross Cancer Institute
  - Thunder Bay Regional Health Sciences Centre
  - Toronto Sunnybrook Regional Cancer Centre
  - Nova Scotia Cancer Centre
  - Peter MacCullum Cancer Centre (TROG)
- Dry Run reviewers
  - Technical: 4 volunteers
  - Clinical: Reviewing centres

Challenges Post-Production Server

- IS support at the submitting institutions
- Time to climb the learning curve
- Data security issues (common concern)
- Establish Standard Operating Procedures (SOPs)
  - New user registration and privilege assignment
  - Installation procedure for RCET software and required source code and software packages
  - Moving test server into production
  - Bug reporting and resolution
  - …

MA.20 Submitted Cases

- 10 cases submitted for rapid or final review



MA.20 Accrual to June 13, 2005

- Total Accrual
  - Accrual = 1315
  - Partial June Accrual = 22
- ~35 patients per month
- 472 accruals remaining
- ~13 months

- NCIC/Canadian
  - Accrual = 1171
  - Partial June Accrual = 16
- CTSU
  - Accrual = 52
  - Partial June Accrual = 2
- TROG (AUXT)
  - Accrual = 92
  - Partial June Accrual = 4

MA.20 Goals (July to December, 2005)

- Perform rapid reviews for credentialed institutions
- Perform final reviews for credentialed institutions
- Educate submitting institutions
  - Hands-on assistance with credentialing
  - CARO presentation, September
- Credential more institutions
  - Canadian institutions
  - Top accruing centres to MA.20 from the US
  - Australia
- Develop distributed and redundant personnel infrastructure to
  - Perform technical dry run reviews
  - Perform clinical dry run reviews

ROQAC Goals (July to December, 2005)

- Pilot Project to re-evaluate submission of Dicom-RT and RTOG data objects to NCIC CTG Data Warehouse (Method 4)
- Select NCIC CTG protocol to use as test of 3D data sets using RCET technology
- Develop QA goals for NCIC CTG for next 5 years (e.g. 'Vision Statement')
- Establish guidelines to access NCIC CTG Data Warehouse for non-NCIC sponsored trials
- Grant application with ATC/RCET to provide continued support and development of infrastructure & operating procedures (hardware, software, personnel) at NCIC CTG

Summary and Conclusions

- NCIC CTG data warehouse is being used clinically for MA.20 rapid real-time and final review
- Pilot Project will evaluate Method 4 for NCIC CTG protocols
- Collaborative Grant application between NCIC CTG & ATC/RCET to assist with development and clinical support of NCIC CTG Data Warehouse

Questions for ATC

- Can NCIC CTG use the QARC IMRT questionnaire for a Canadian survey ?
- Old Questions
  - How are software changes made to RCET software in Kingston, Gainsville, and St Louis merged ?
- Other Questions ???

NCIC CTG Home : NCIC Clinical Trials Group - Mozilla Firefox

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http://rcet.ctg.queensu.ca/

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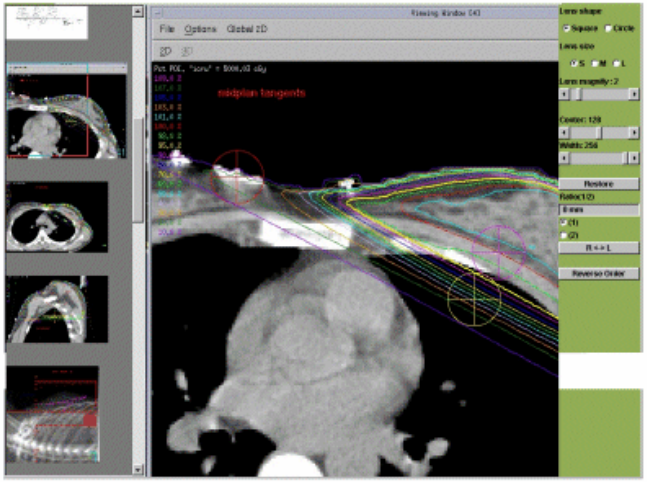
Welcome to the National Cancer Institute of Canada Clinical Trials Group (*NCIC-CTG*).
NCIC-CTG provides resources to facilitate the conduct of advanced technology radiation therapy clinical trials while maintaining patient confidentiality.

The **NCIC-CTG** Radiotherapy Review system developed in collaboration with the Advanced Technology Consortium (ATC) using the Resource Center for Emerging Technologies (RCET) software has the following characteristics:

- Web-based secure data submission, retrieval and archiving.
- Compliant with HIPPA requirements.
- Distributed server architecture.
- Supports DICOM, DICOM-RT, RTOG and common electronic image formats.
- Web-based 2D / 3D visualization tools.
- Web-based rapid review tools.
- Multi-tiered distributed client-server architecture.
- Storage of clinical data objects in a content-based relational database for retrieval and data mining.



CTG's new **Rapid Review** tool

Best Viewed with
Netscape 7.01, FireFox 1.0
or Internet Explorer 6.0 SP1

National Cancer Institute of Canada, Clinical Trials Group
Queen's University, Kingston, Ontario

Radiotherapy Review System developed in collaboration with the Advanced Technology Consortium
using the Resource Center for Emerging Technologies software

If you have any questions, comments or suggestions, please contact our Systems Administrator

Done

GP

Jan 2005, Summary and Conclusions

- Installation of the RCET infrastructure is not yet plug and play. Other groups should be made aware that dedicated resources must be provided:
  - 0.5 FTE systems support staff
  - Hardware/software cost to-date: ~$50,000 CAD
- Better documentation and SOPs will facilitate distribution of RCET system to other groups
- NCIC CTG is too reliant on volunteers: Liz Elliot, Lam Pho, Sonia Schellenberger, Wendy Parulekar, Colin Field

RCET Meeting

RCET Support

- Bug fixes
- Request for access to RCET
- WebSys
- ?

Outstanding Items – RCET / NetSys

1. Remove, or password protect, log files which contain confidential information
2. Add user verification during NetSys download
3. Addition of appropriate MA.20 dataset to NetSys download for training
4. Problem with Case ID not being unique across NCIC protocols – temporary solution DR_CALM0007. Other protocols will reuse case #.
5. Use version 3 of the rapid review tool - done