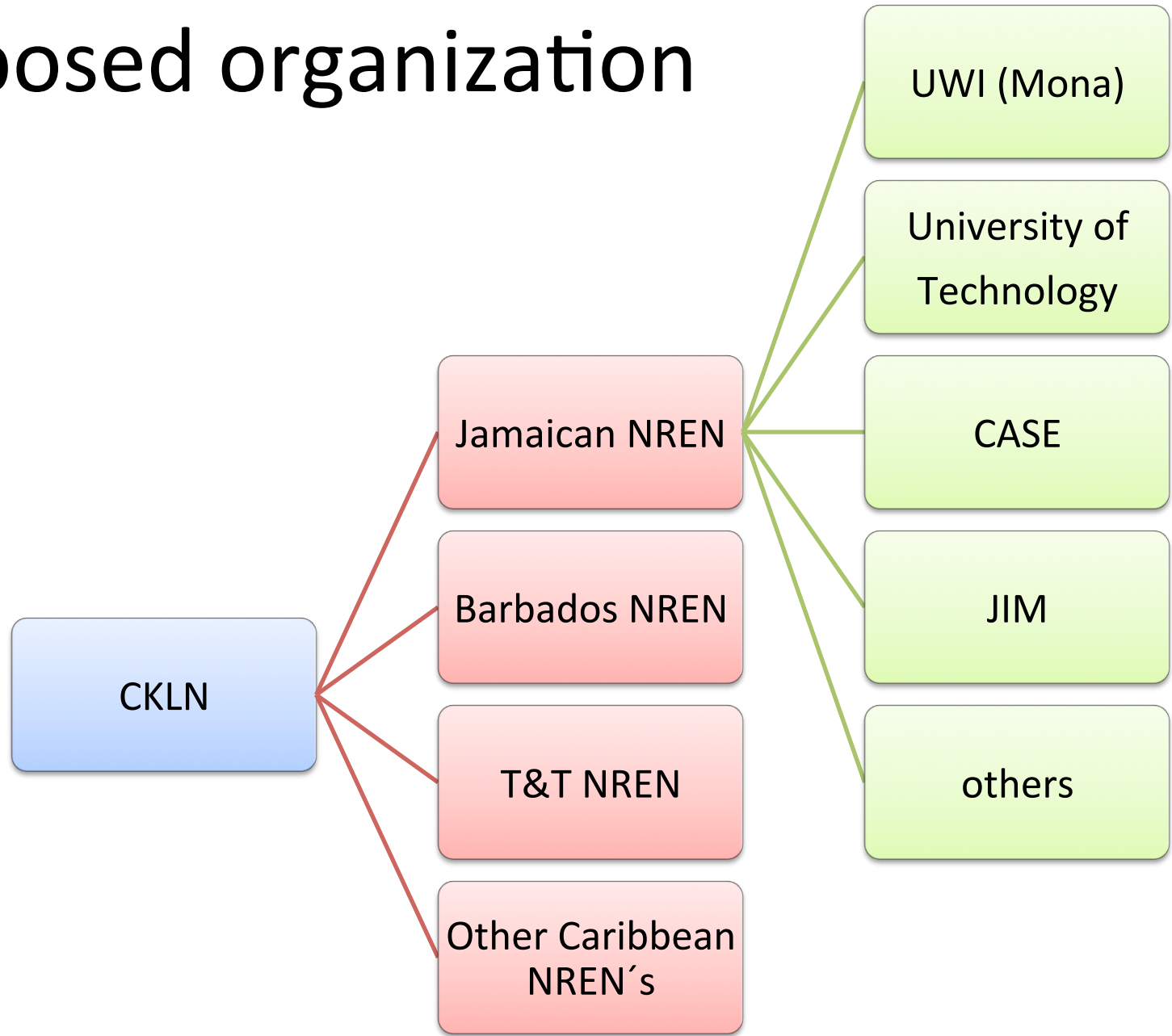


# Developing NREN's

How to start working?

1. Decide about governance framework
2. Decide about services and organization structures
3. Promote applications development.

# Proposed organization



# JNREN

Identified institutions to benefit from NREN development (blueprint):

- University of West Indies
- University of Technology of Jamaica
- Teacher Training Colleges
- Community Colleges
- Vocational Training Development Institute
- Constabulary Staff College
- Management Institute for National Development
- The Institute of Jamaica

# JNREN

- Private universities, colleges and institutions
  - Northern Caribbean University
  - University College of the Caribbean
  - International University of the Caribbean
- Secondary and primary schools
- Public Research Institutions
  - Sugar Industry Research Institute
  - Statistical Institute of Jamaica (STATIN)
  - Bodles Agricultural Research Station
  - Scientific Research Council
  - Planning Institute of Jamaica

# JNREN

Some other institutions should be considered:

- Hospitals
- Cultural institutions
- Private institutions doing research

# Government framework

# JREN (from blueprint)

## Proposed governance framework

- General Assembly
- Board of Directors - structure and regulations to be confirmed by the Ministry of Education
- Secretariat

# JREN-Functions of the Board (cont.)

- Leading the strategy and development directions of JREN.
- Assessing the implementation of the budget and action plan of JREN.
- Providing its opinion to the General Assembly and the Minister of Education with regard to candidates for the position of Chief Executive Officer.
- Approve the procedure for providing paid services of JREN and the respective price list.
- Approving the procedure and conditions for qualification as an JREN customer.
- Performing other duties assigned by the General Assembly.

# JREN - Organization of the Board (cont.)

The Board should comprise 7 to 9 members, appointed by the Minister of Education on the advice of the General Assembly.

Members of the Board will comprise major champions of NREN drawn from university leadership, college leaders, ministry of education and others.

The Board should not be based on ICT directors.

# Services and applications – context - opportunities

- Jamaica boasts one of the more sophisticated information technology infrastructures in the region .
- Diverse range of service skills: software design and development, IT Consulting, data management services, database training, systems integration, network administration and support, MIS auditing, security solutions, VoIP/IT hardware, graphic design and web support services are some of the more advanced offerings.
- Jamaica's ICT enabled services and the business process outsourcing markets are the most developed in the Caribbean, providing outsourcing solutions to international entities.

# Recommended Services (blueprint)

The key services include:

- Operating a videoconference bridge and providing access to the MBone virtual network for videoconferencing and video transmission on the Internet, using IP multicasting to supply streams of audio and video data
- Hosting Higher Education Management Information System
- Hosting Learning Management Systems (LMS)
- Hosting of digital libraries
- Facilitating e-Learning, and virtual classrooms
- Providing Web hosting, as necessary
- Providing technical support services such as equipment sourcing, tender development, etc. to its members if needed

# Recommended services – Phase 1 (2011-2012):

- Improved access to commodity Internet access
- Hosting of Network Operation Center, traffic monitoring and shaping
- Hosting of Learning Management Systems
- Full featured e-Learning platform, tools and portals for collaboration in course and program development between Jamaica tertiary institutions
- A multiparty video conferencing platform
- Online security tools
- Hosting of digital library resources
- Software licensing
- Catalogue systems and document delivery
- Community web platforms such as wikis

# Recommended services – Phase 2 (2012- onward)

Provide access to high cost instrumentation and laboratories

Customize connectivity solutions for research teams collaborating globally

Implement grid applications such as high-capacity storage and remote computing power

Implement streaming video

Provide online web-shops for a range of academic services

# Recommended Applications (Phase 2)

- Natural Disaster systems – hurricane, flood, tsunami and earthquake warning, prediction, and monitoring
- Climate change research, meteorology, environmental monitoring and data sharing
- Telemedicine and remote diagnostics
- Cloud computing initiatives such as remote computing and high-capacity storage and data repository sharing
- Monitor emerging pandemics
- Bio-informatics, Agro-informatics, Astronomy, eVLBI (grid of radio telescopes)
- Host a point of presence for the Caribbean Digital Heritage Exchange

# Some recommendations

- Collaborate !!!
- Take the time to think how to get organized, prepare the plan and pave the road.
- Don't expect short term results.
- Continue your important efforts related to the use of the infrastructure for improving learning and teaching processes as well as distance education.
- Contribute within your institutions to the understanding of the initiative:  
How to take advantage of the opportunities of this network and services for improving innovation, research, education, culture?

THANK YOU !

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