

Conference 2017



Successful Collaborative Communities

A Look at Developments in The BCNET Shared Services Portfolio



Network Services

Marilyn Hay



Vision

We will deliver, operate and advance network infrastructure to support education, research and innovation in British Columbia.

Network Services

Physical Access



- Fibre Connection
- Fibre Cross Connect
- Point to Point Ethernet

Layered Services



- Advanced Network
- Internet Transit
- Transit Exchange
- Virtual Router

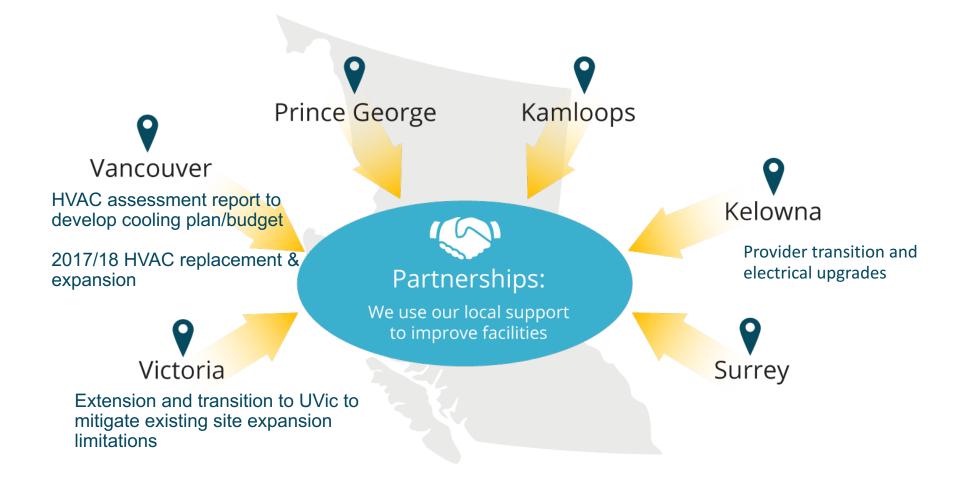
NREN, Canada's National Research and Education Network

The wide area network is built through collaborative partnerships **BCNET** Prince George Kamloops Vancouver Kelowna Victoria



Seattle

Transit Exchange Infrastructure Upgrades



By Members, For Members Fibre Infrastructure Investments

2016/17

- Built 279 fibre kilometres
- 9,752 fibre kilometres = size of network asset measure
- Surrey Memorial Hospital
- Simon Fraser University, Graduate Residence
- Kamloops EduCloud Expansion

2017/18

- Douglas College
- Justice Institute

Oversight by Finance Committee

Invest & develop with members & local partners

Reviewed by

Network Services
Committee

Fibre Infrastructure Working Group



Advanced Network Service

100 Gigabit Ethernet infrastructure

- Core segments
- Member 100 gigabit connections
- CANARIE partnership/shared project for path diversity
- Lifecycle upgrades

2017/18

- Plan diverse connectivity for Exchange sites
- Prepare 100 Gig upgrade to Surrey Exchange
- Review network architecture



Peering Service

Connected New Peers

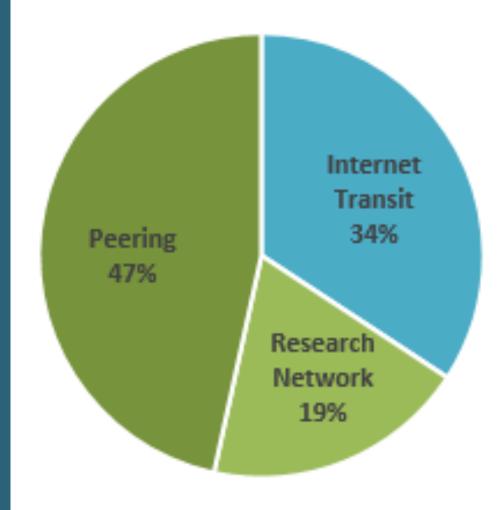
CANARIE Content Delivery Service added Cisco, Webex, IBM, Softlayer

Amazon, D2L, Facebook, Limelight, Microsoft, Novus, Rackforce, Vancouver Internt Exchange, Yahoo!

Local caches, Akamai, Google

Internet Transit & Peering Working Group

- Collaborative member community
- POC: Apple Caching Service



\$1.5 M in avoided costs

Integrated Network Support Committee

Network Service Fund Model



Integrated Network Progress...

Remaining Quotes Mar 2017 **Implementations** tender remaining 9 UFV, OC, DC, JI institutions, 50 sites June 2017: COTR, Target implementations 13 of 13 submitted SEL Jun 2017 to Dec 2018

MAVED reviewed and prioritized

Proposals

Model Spring 2015 3 to 4 year timeline

64% of PSIs directly connected 119 campus locations Member-driven implementations

Distributed Network Management

Vancouver | Core Staff

Blake Bridgewater

Alex Doradea-Cabrera

Don McWilliams

Oscar Rondon

Dave Stillwell

Toby Wong

Kamloops | TRU

David Burkholder

Wes Cole

Kelowna | UBCO

Keelin O'Reilly

Steve Rosco

Prince George | UNBC

Curtis Bowden

Surrey | SFU

Vic Herbert

Victoria | UVic

Steve Lahey

Pat Todd

Hans Yodzis

Staff

UBC | Operations

Rose Chan

Staff



Shared Systems and Technology

Dean Crawford

Vision

To facilitate collaborative and innovative information technology solutions to support the delivery of education and research.

What we do

Information Technology Services

- ••EduCloud
- • Digital Signage
- • DATA-SAFE
- ••Video Conferencing

Enterprise Applications

- ••Kaltura
- ••Moodle

Educational Technology

••Desire2Learn

Licensing and Procurement

- ••Microsoft
- •• Ellucian products
- ••SPSS
- Software/hardware

Who we collaborate with

ASC

- ••Logistics
- ••EduCloud Colleague

BCcampus

- ••Kaltura
- ••D2L
- ••Moodle

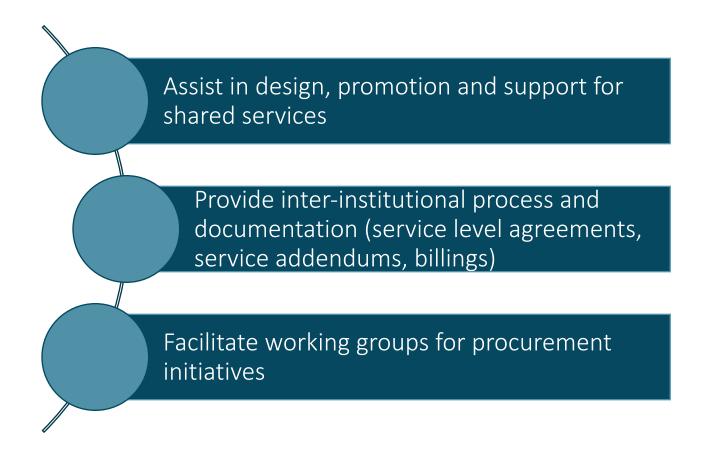
ASDT/Ministry

- Metrics
- ••EduPlanner

Financial Aid Consortium

- ••Logistics
- Billings/Payments
- ••Facilitator with ellucian

Services we provide



Information Technology Services

See: Service Catalogue for full list https://www.bc.net/service-catalogue

EduCloud

Digital Signage

DATA-SAFE

Video Conferencing

Enterprise Applications

See: Service Catalogue for full list https://www.bc.net/service-catalogue

Moodle

Kaltura

Educational Technologies

See: Service Catalogue for full list https://www.bc.net/service-catalogue

Desire2Learn

Current IT Licensing

See: Service Catalogue for full list https://www.bc.net/service-catalogue

Microsoft

Survey Tool

SPSS

Adobe

Current IT Contracts

See: Service Catalogue for full list https://www.bc.net/service-catalogue

Core/Edge Switches

Network Firewalls

Network Storage

Wireless Networking

Servers



Upcoming Projects and Services

LinkedIn Learning (Lynda.com)

Code Repository

EduCloud Expansions (BaaS, DR)

Updated Video Conferencing Service

IT Contracts

Donor management, Low-cost video conference end points



Team Members





Information Protection

Ivor MacKay

Vision

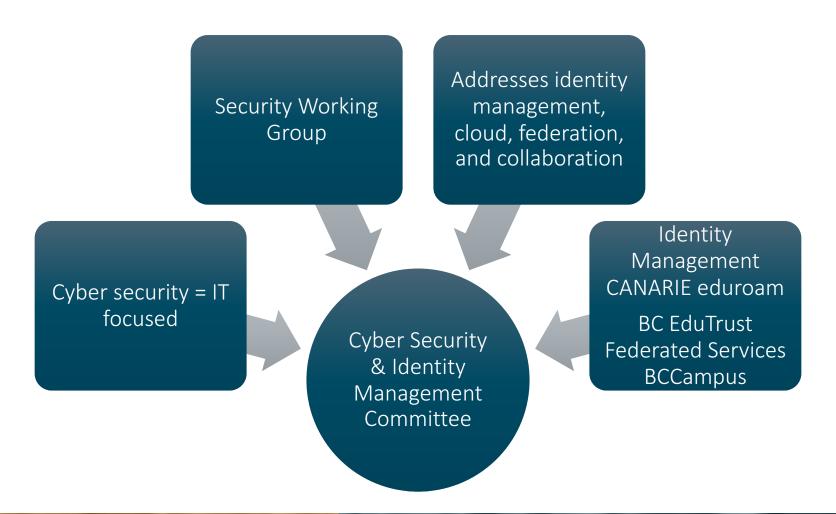
We will empower members to continuously improve information protection.

Information Protection is Key

Top 10 IT Issues Educause 2017

"Developing a holistic, agile approach to reduce institutional exposure to information security threats"

Information Protection Services Committee Renewal



Next Steps & Focus

Investigate incident management

Control access and manage identity

Incident preparedness & response

Analyze security/testing

Security policies, standards, procedures and guidelines

Office 365/Azure security

Network Security

DDoS Events

Results

- • DDoS Mitigation project with member participants
- ••Investigate options for a BCNET DDoS mitigation service

- ••Survey of member CIOs to gauge interest
- • Create recommendation report

Next Steps

- Develop community best current practices
- Increase member participation and awareness
- ••Compile options for 'scrubbing' services



Dennis Silva



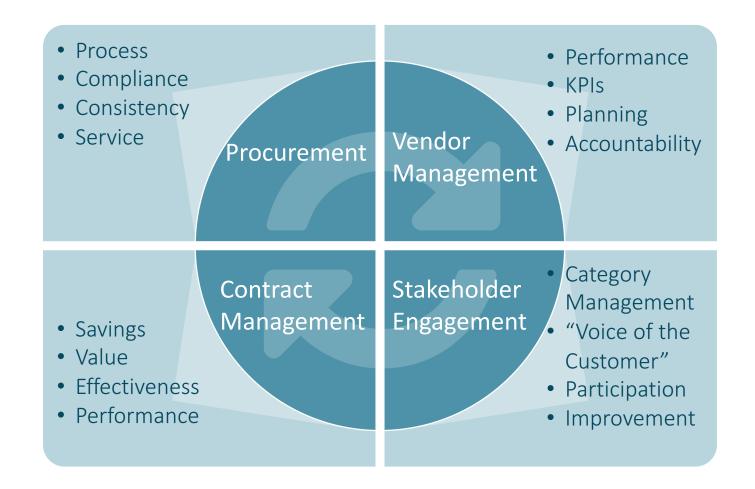
Vision

We will provide outstanding value to member organizations through supply management expertise, innovation and collaboration.

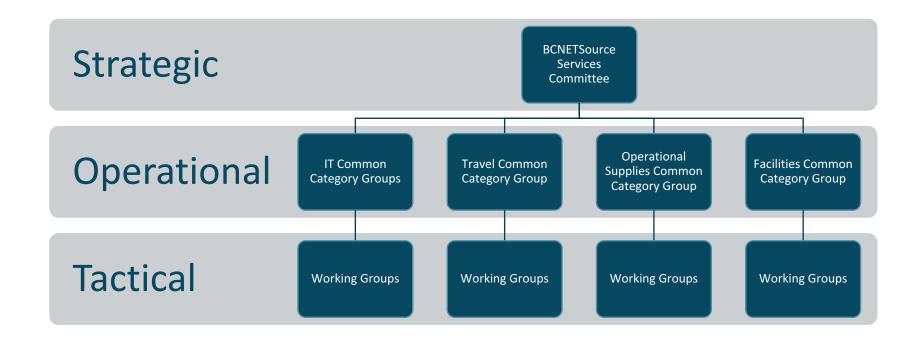
Value to BCNET Members

In-house public procurement expertise, contract management and compliance with trade and regulatory standards

What we do



How we work together



Who we collaborate with

Members

- Contract Management
- Contract Support
- Awareness

BCNET SST & Network

- Procurement
- Policy and Compliance
- Contact Support

Other Groups

- BCCampus
- BCEM
- EDCO
- GPO's

Vendors

- Contract
 Administration
- Reporting
- Vendor Management

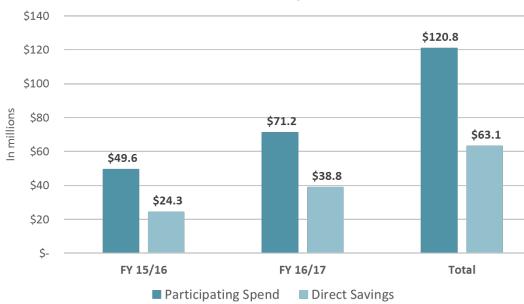
ASDT Ministry

- Benefit Reporting
- ASDT Procurements
- Leadership

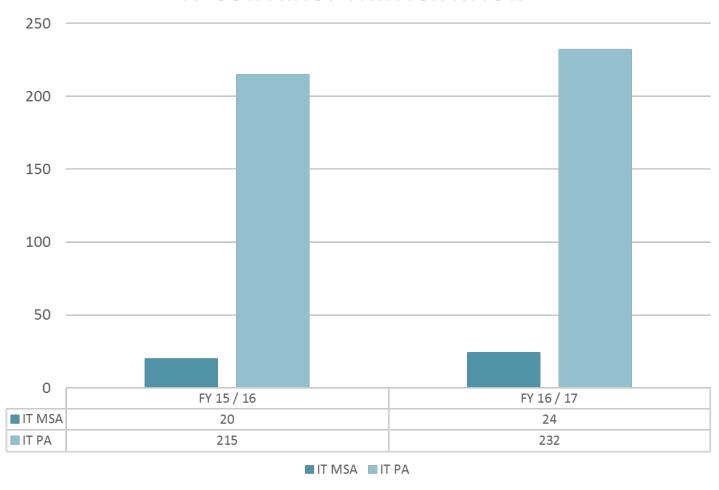
IT Contracts

Participating Spend Direct Benefits

IT PARTICIPATING SPEND / DIRECT BENEFITS



IT CONTRACT PARTICIPATION





IT Contracts 2016/17

Core / Edge Switch Addendum – Juniper Networks

Data & Consulting Services – Steeves and Associates

Hardware VAR Extension – Long View Systems

Mass Notification System – Regroup

Network Circuits RFEOI – underway

Network Storage – NetApp / DellEMC

Server Hardware Contracts – Cisco / DellEMC

8 new or extended contracts made available to members

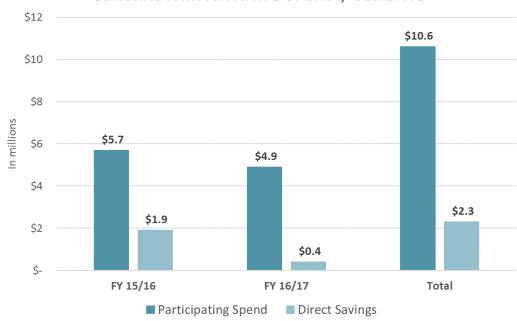




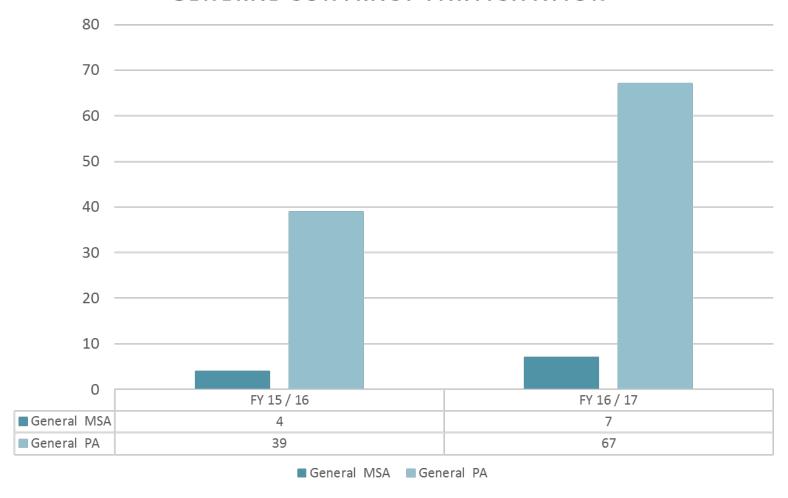
General Contracts

Participation

GENERAL PARTICIPATING SPEND / BENEFITS



GENERAL CONTRACT PARTICIPATION





General Contracts 2016/17

- Cylinder Gas Praxair
- Customs Brokerage Thompson Ahern
- Fire Extinguisher Testing Pacific Coast
- Natural Gas Consultant Services Independent Energy
- Multi Function Devices Ricoh
- Office Supplies RFP Staples Advantage
- Trades Equipment Various 11 Contracts
- Travel Various 6 Sub Agreements

21 contracts made available to members or to support procurement activities

IT Procurement Pipeline 2017/18

- In Development: Request for Proposals
 - Cellular plan
 - Skype enabled VOIP
- Planned
 - Edge switch contract extensions (2)
 - Firewall contract extensions (2)
 - IT pre-qualified services
 - Network services (various)
 - PSTN contact extension
 - Software VAR RFP

General Procurement Pipeline 2017/18

- In Development (Request for Proposals, Info, Quotes)
 - Actuarial Services
 - Facilities Pre Qualified Suppliers
 - Fine Paper and Stationary
 - Promotional Products
 - Maintenance Repairs and Operations
 - Traveller Emergency Services
- Planned
 - Custodial Supplies
 - Elevator Maintenance Services
 - External Audit Services
 - Group Travel Amendment





Professional Development & Training Services

Clarence Lee

Vision

We will enable continuous IT knowledge improvement through collaborative and innovative methods

Professional Development & Training Services Goals

Support & facilitate IT training

Negotiate competitive pricing

Aggregate seat counts

Offer diverse training methods

Meet members' needs

Member Outreach

We consult with our member community

March 2017 Survey

• 80% member response rate

Survey to gauge member interest:

- Subject domain areas
- Course timelines
- Preferred training delivery method
- General feedback

Visit our Service Catalogue

www.bc.net/service-catalogue/professionaldevelopment-and-training

clientservices@bc.net

Survey Findings - Key Areas

Microsoft (O365, PowerShell)

IT Security (Firewalls, Networking)

Project Management (Agile, Scrum)

ITIL (Foundations, Practitioner)

COBIT (Foundations)

Member Areas of Interest

LEAN IT

Business Relationship Management

Change Management

Hardware (Wireless, Networks)

Course Offerings 2017

Upcoming

ITIL Foundations (May 17–19)

In Development

- ITIL Foundations (Fall/Winter)
- COBIT 5 Foundations (Summer and Fall)
- Banner Technical: Extending Banner Admin XE Apps (Summer)
- Banner Technical: Introduction to Groovy and Grails (Summer/Fall)

Questions?