

# The General Assembly's IT Unit & the Proposal to Divide Legislative Council into Three Offices

## House Committee on Government Operations

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# To Keep in Mind

- Fundamental disagreement as to how IT should be managed and delivered
- Two questions that may help frame solution
  - ✓ What matters most?
  - ✓ What are the problems?

# Annual Expenditures IT

Total FY 16 \$1,200,000

Salaries & benefits \$ 668,000

✓ Leg. Council IT \$473,000

✓ JFO IT (estimated) \$ 70,000

✓ JFO consultant (estimated) \$125,000

“Summer projects” \$ 170,000

Routine costs & supplies \$ 370,000

# IRC “Decoupling” Project

- Background IRC & decoupling project
- Project management structure
  - ✓ Managed by committee of 5 staff offices, not IT
- Contract signed July 13, 2015
  - ✓ IRC to deliver fully functional product November 1, complete work December 31
  - ✓ IRC failed to meet deadlines
  - ✓ IRC declined to sign extension agreement
- Current status

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- I. How are IT services provided & overseen?
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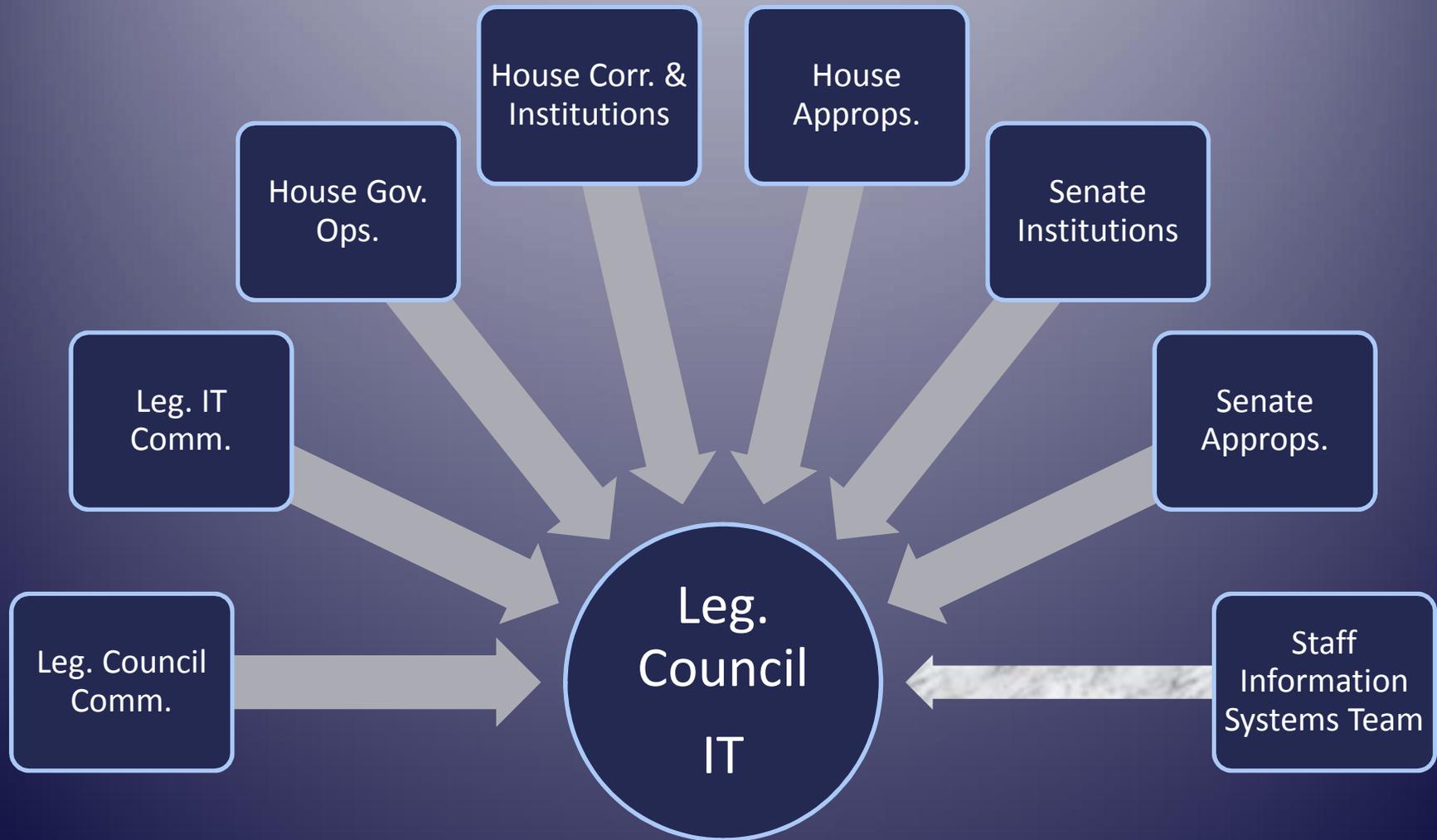
# How are IT Services Provided?

- 1989 - 2012
  - ✓ IT unit part of Legislative Council
  - ✓ Minimal supervision
  - ✓ Best practices not always followed
  - ✓ Resulting problems

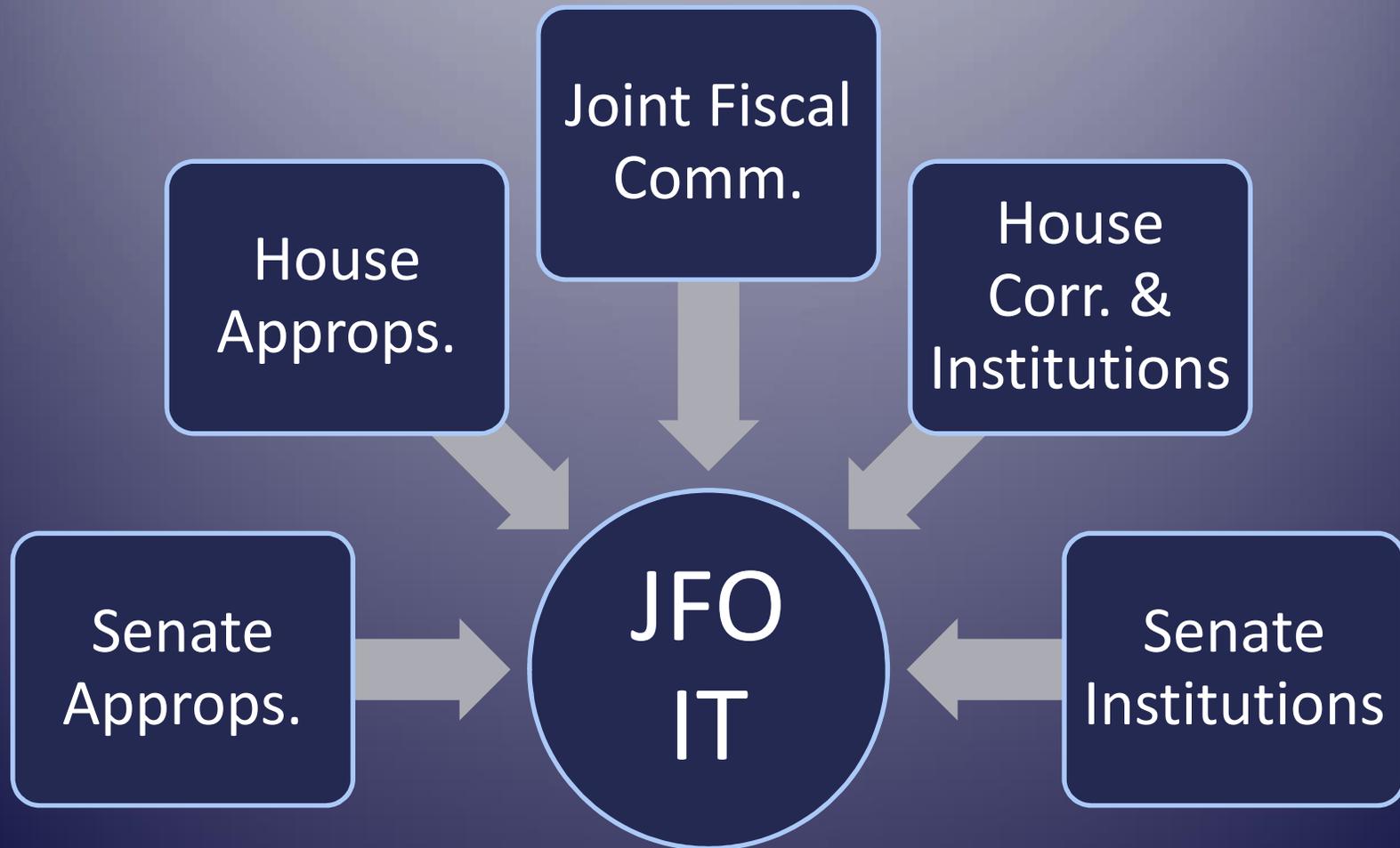
# How are IT Services Provided?

- 2012
  - ✓ Decision by President Pro Tempore & Speaker & Leg. Council Committee
    - IT continue to be part Leg. Council
    - Centralized management and budget
    - Fix problems
    - Follow best practices
- 2015
  - ✓ “Systems Team” to manage IRC “decoupling” project

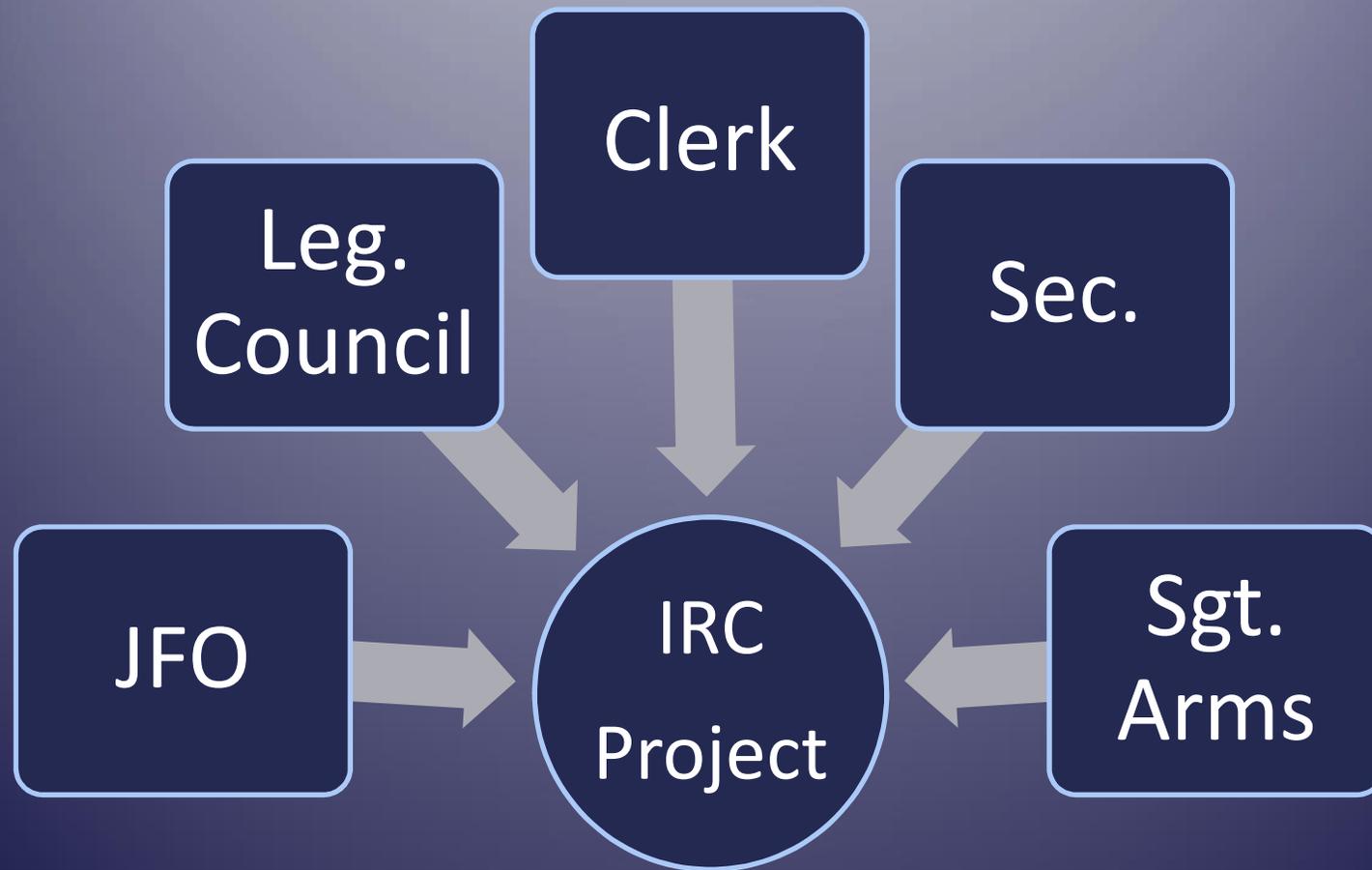
# How is IT Overseen? Leg. Council IT



# How is IT Overseen? JFO IT

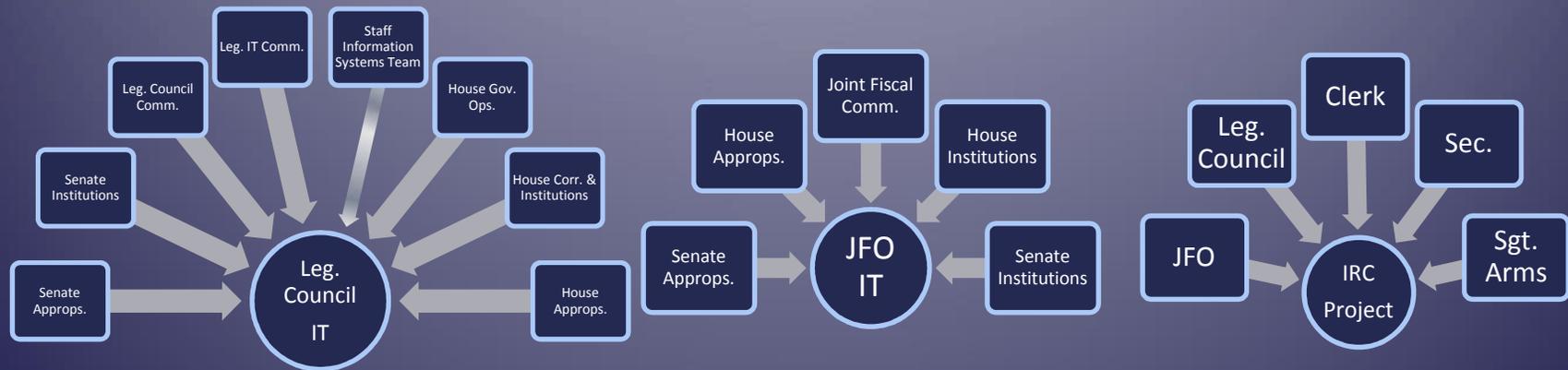


# How is IT Overseen? IRC Decoupling Project



# How is IT Overseen?

## Overall IT Governance



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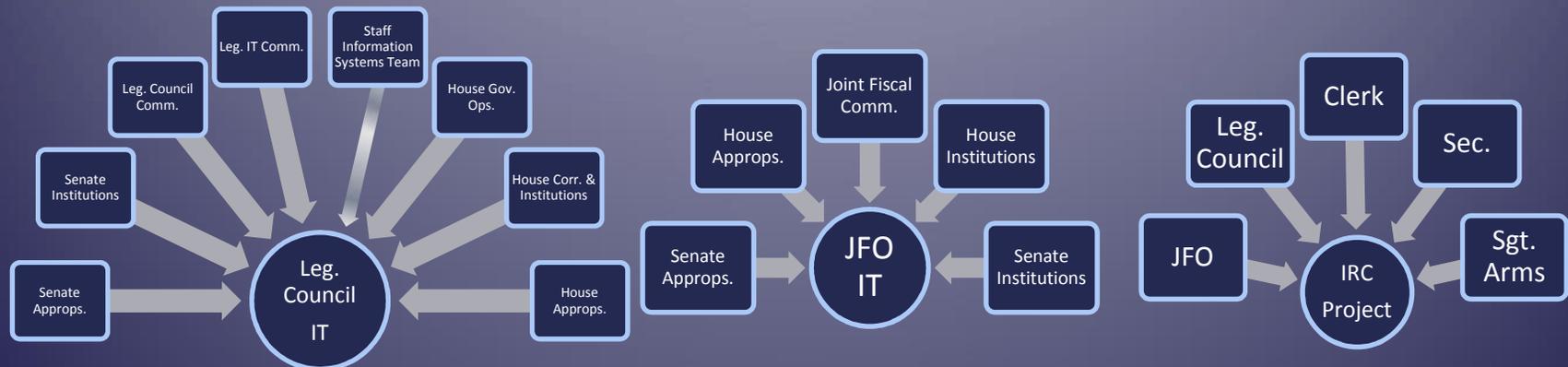
# Relevant Best Practices

- 1) Structure & oversight
- 2) Budgeting
- 3) Contracting
- 4) Project management

# Best Practices: Structure & Oversight

- Should set up IT organizations to:
  - ✓ Follow best practices
  - ✓ Do so consistently (*Jerry Mechling (Gartner), 11/16/15 briefing*)
- Multiple committees with ill-defined decision-making responsibilities (*Auditor, VHC Future Improvement, pp. 15-16*)
- If every agency or department has its own “wants” and there are different “islands” of IT, no one is overseeing all projects (*Dan Smith, Gov. Ops. 1/27/16*)

# Do We Follow Best Practices in Structure & Oversight?



# Best Practices: Budgeting

- Best practices
  - ✓ Michigan has centralized IT budget and personnel
  - ✓ Washington emphasizes prioritization of IT requests (*Doug Robinson, Nat. Assoc. State CIOs, Nov. 2015*)
- Centralization allows prioritization to carry out a project successfully

# Do We Follow Best Practices in Budgeting?

- Pre-2012
  - ✓ Budget for IT projects
  - ✓ Lack consistency: Separate big ticket items (IRC)
- 2012: Centralized
  - ✓ Project list & priorities reviewed & approved by all other offices, IT Comm. & Leg. Council Comm.
  - ✓ All projects within Leg. Council IT budget
  - ✓ Reason: Management, prioritization & ability shift resources
- 2015: IRC decoupling project

# Best Practices: Contracting

- Use contracts, work should never be done without a legal agreement *(Auditor, VHC Status of Planned Enhancements, pp. 3, 20, 24)*
- Centralize contracting process *(Special Committee, p. 16)*
- Penalties & performance-based contracting: contracts should contain “clauses that provide monetary consequences tied to the contractor’s performance” *(Auditor, VHC Future Improvement, pp. 11, 44)*
- Use open and competitive bidding process *(Auditor, Sole Source Contracts, p. 3, Dec. 14, 2015)*

# Do We Follow Best Practices in Contracting?

- Pre-2012: No standard process
  - ✓ Attorneys not used
  - ✓ Not performance based
  - ✓ Did not always use a competitive bid process
- 2012: Consistent process & best practices
  - ✓ RFPs and competitive process
  - ✓ Contracts negotiated by attorneys
  - ✓ Contract provisions: Lump sum, payments based on deliverables, penalty clauses
  - ✓ Results: Website & new e-mail system

# Do We Follow Best Practices in Contracting?

- 2015 IRC decoupling project
  - ✓ Leg. Council attorneys wrote contract & included milestones and penalty provisions
  - ✓ However, currently no contract or legal document in place
  - ✓ Disagreement as to penalties

# Best Practices: Project Management

- VHC: project management was “ineffective,” did not follow best practices, and no project “ownership” (*Auditor, VHC Future Improvement, p. 15*)
- “Must get one person to say ‘I own this,’ there has to be one person on top” of a project (*Dan Smith, H. Gov. Ops.*)
- The cause of most project failures is not technical but poor project management (*Michael Schirling, Special Committee*)

# Do We Follow Best Practices in Project Management?

- Pre-2012
  - ✓ Lack consistent process or clear decision-making
  - ✓ Project milestones & project timeline not enforced
- 2012
  - ✓ Clear ownership & decision-making process
  - ✓ Prioritize and shift resources
  - ✓ Monitor progress, budget & timeline
  - ✓ Enforce milestones and due dates

# Do We Follow Best Practices in Project Management?

- 2015: IRC decoupling project
  - ✓ Management by committee
  - ✓ Delays
  - ✓ No one project manager: Who is in charge?
  - ✓ Unilateral actions

# Success Rate – Projects 2012

<u>Project</u>	<u>Vendor or Staff</u>	<u>Success or Failure</u>	<u>On Budget</u>	<u>On Time</u>	<u>Notes:</u>
Implemented WhatsUpGold network monitor	Vendor/Staff	Failure		No	Marty left during project.
<b>Reapportionment</b>	Staff	Success	Yes	Yes	
<b>Office 2010 Upgrade</b>	Staff	Success	Yes	Yes	
DM Upgrade	Staff	Success	Yes	Yes	
<b>xmLegislator modifications for Office 2010</b>	Vendor	Success	No	Yes	Overbudget ~\$15-18K?
<b>Replaced Trend Micro Office Scan with Trend Micro Deep Security.</b>	Vendor	Success	Yes	Yes	
Modify DM for passive integration; compatibility with xmLegislator	Vendor	Success	Yes	Yes	
Created 40s Wiring closet	Vendor	Success	Yes	Yes	
30s renovations – install whiteboards and projectors in all rooms	Vendor	Success	Yes	Yes	
Moved large wall monitor from Room 33 to Ethan Allen Room	Vendor	Success	Yes	Yes	
<b>Expand iPads to House Appropriations, Health Care, Judiciary, &amp; Ways and Means</b>	Staff	Success	Yes	Yes	
Change administrative passwords and security requirements	Staff	Success	Yes	Yes	
Implement master password list	Staff	Success	Yes	Yes	
Committee web pages (SharePoint) for Health Care	Staff	Success	Yes	Yes	
House sound system upgrade.	Vendor	Success	Yes	Yes	
Workstation and printer replacements	Staff	Success	Yes	Yes	
Re-purpose VDI VMWare hosts to production server cluster	Staff	Success	Yes	Yes	
Replaced HP WiFi hardware with Ruckas	Vendor	Success	Yes	Yes	
Replaced server room racks, wiring management	Vendor	Success	Yes	Yes	
Permanent projection screens and infrastructure in House chamber	Vendor	Success	Yes	Yes	
Installed additional Ethernet cables to satellite switch locations	Vendor	Success	Yes	Yes	
<b>Number of Projects</b>	<b>% Staff Only</b>	<b>% Successful</b>	<b>% On Budget</b>	<b>% On Time</b>	
21	42.86%	95%	95%	95%	

# Success Rate – Projects 2013

<u>Project</u>	<u>Vendor or Staff</u>	<u>Success or Failure</u>	<u>On Budget</u>	<u>On Time</u>	<u>Notes:</u>
<b>Security audit</b>	Vendor	Success	Yes	Yes	
<b>Replace main SAN (storage device)</b>	Staff	Success	Yes	Yes	
Implement real-time replication using old SAN in Senate vault, relocated AD server to Senate vault	Staff	Success	Yes	Yes	
Implemented rolling switch replacement	Staff	Success	Yes	Yes	
Upgrade SQL server and implement failover cluster	Vendor	Success	Yes	Yes	
Upgrade VMWare to current revs	Vendor	Success	Yes	Yes	
<b>Migrate GroupWise users to Exchange 365</b>	Vendor	Success	Yes	Yes	Under budget - ~\$30K
Migrate all old GroupWise archives to Exchange 365	Vendor	Success	Yes	Yes	
Installed 5 servers in support of Exchange 365	Staff	Success	Yes	Yes	
Replace copy room copiers	Staff	Success	Yes	Yes	
<b>40s renovations – install whiteboards and projectors in all rooms</b>	Vendor	Success	Yes	Yes	
<b>Expand iPad project – all House committees, most of Senate</b>	Staff	Success	Yes	Yes	
Add additional VMWare host for production servers	Vendor	Success	Yes	Yes	
Rebuilt vCenter management server	Vendor	Success	Yes	Yes	
Split xmlLegislator database by session to restore performance	Vendor	Success	Yes	Yes	
<b>Implemented Committee web pages</b>	Staff	Success	Yes	Yes	
xmlLegislator updates (per user requests)	Vendor	Success	Yes	Yes	
Upgraded Senate office connectivity	Staff	Success	Yes	Yes	
Upgraded Senate office workstations	Staff	Success	Yes	Yes	
<b>Replaced scanning infrastructure</b>	Staff	Success	Yes	Yes	
Moved large wall monitor from Room 41 to Room 10.	Vendor	Success	Yes	Yes	
Replaced Room 41 monitor with smaller monitor (small room)	Vendor	Success	Yes	Yes	
Completed replacement of HP WiFi hardware with Ruckas	Vendor	Success	Yes	Yes	
Undertook discovery searches of email for public records requests	Staff	Success	Yes	Yes	
Installed cabinet for laptop library with power and connectivity	Staff	Success	Yes	Yes	
Developed single image for all workstations and laptops	Staff	Success	Yes	Yes	
Installed KMS licensing server	Staff	Success	Yes	Yes	
Replaced WiFi print server	Staff	Success	Yes	Yes	
<b>Migrated main file server to Server 2008</b>	Staff	Success	Yes	Yes	
Installed new JFO database server	Staff	Success	Yes	Yes	
<b>Implemented VEEAM backup</b>	Staff/Vendor	Success	Yes	Yes	
Upgraded PA system in Room 11; installed PA system in Room 10	Vendor	Success	Yes	Yes	
Workstation and printer replacements	Staff	Success	Yes	Yes	
<b>Number of Projects</b>	<b>% Staff Only</b>	<b>% Successful</b>	<b>% On Budget</b>	<b>% On Time</b>	
	33	54.55%	100%	100%	100%

# Success Rate – Projects 2014

Project	Vendor or Staff	Success or Failure	On Budget	On Time	Notes:
<b>Website project</b>	Vendor	Success	Yes	Yes	
Implemented new virtual servers for web project	Staff	Success	Yes	Yes	
<b>Replaced main firewall</b>	Staff/Vendor	Success	Yes	Yes	
DM upgrades	Staff/Vendor	Success	Yes	Yes	
Committee room digital recording pilot	Staff	Success	Yes	Yes	
Installed Audio Repository server	Staff	Success	Yes	Yes	
xmLegislator updates (per user requests)	Vendor	Success	Yes	Yes	
Experimental modification to xmLegislator Agenda module (de-Word)	Vendor	Success	Yes	Yes	
<b>Replaced SCCM server</b>	Staff	Success	Yes	Yes	
Updated VMWare and SQL to current release levels	Staff	Success	Yes	Yes	
Updated Trend Micro antivirus system	Vendor	Success	Yes	Yes	
Continued rolling switch replacement	Staff	Success	Yes	Yes	
Installed network attached storage for backups	Staff	Success	Yes	Yes	
Migrated and updated Veeam backup	Staff	Success	Yes	Yes	
Replace workstations and printers	Staff	Success	Yes	Yes	
Installed projectors and whiteboards in last two House committees	Vendor	Success	Yes	Yes	
Installed speakerphones in all Senate committee rooms	Vendor	Success	Yes	Yes	
Investigated possible replacements for DM	Staff	Success	Yes	Yes	
<b>Implemented Cisco Meraki Mobile Device Management system</b>	Staff	Success	Yes	Yes	
PowerShell, Security, ICND training for IT staff	Staff	Success	Yes	Yes	
Replaced WebDAV server with FTP application (iPads)	Staff	Success	Yes	Yes	
<b>Number of Projects</b>	<b>% Staff Only</b>	<b>% Successful</b>	<b>% On Budget</b>	<b>% On Time</b>	
21	61.90%	100%	100%	100%	

# Success Rate – Projects 2015

<u>Project</u>	<u>Vendor or Staff</u>	<u>Success or Failure</u>	<u>On Budget</u>	<u>On Time</u>	<u>Notes:</u>
Council & House office wiring	Staff	Success	Yes	No	Peck Data PM was inconsistant
Add additional VMware Host	Staff	Success	Yes	Yes	
Upgrade to current VMware revisions	Staff	Success	Yes	Yes	
Continued rolling switch replacement	Staff	Success	Yes	Yes	
<b>Implement PRTG Network Monitoring Suite</b>	Staff	Success	Yes	Yes	
Locate Monitoring Suite Off-site	Staff	Success	Yes	Yes	
Replace tape library	Staff	Success	Yes	Yes	
Replace backup server	Staff	Success	Yes	Yes	
Route WiFi through Firewall	Staff/Vendor	Success	Yes	Yes	
Workstation and printer replacements	Staff	Success	Yes	Yes	
Replace Copiers in House, Senate, LC Back Office, 1Baldwin 2nd and 3rd floor	Staff	Success	Yes	Yes	
Reconfigure email authentication	Staff	Success	Yes	Yes	
<b>Mobile Device Evaluation Project</b>	Staff	Success	Yes	Yes	
Digital Recording	Staff	Success	Yes	Yes	
Renew Microsoft Enterprise Agreement	Staff	Success	Yes	Yes	
<b>De-Word IRC xmLegislator</b>	Vendor	?	?	No	
Website updates/upgrades	Staff	Success	Yes	Yes	
<b>Full text search - Calendars and Journals</b>	Vendor	Success	Yes	Yes	
<b>Number of Projects</b>	<b>% Staff Only</b>	<b>% Successful</b>	<b>% On Budget</b>	<b>% On Time</b>	
	18	83.33%	94%	94%	89%

# Overall Success Rate 2012 - 2015

- 93 projects over 4 years
  - ✓ 90 on time = 96.7% on-time rate
  - ✓ 92 on budget = 98.9% on-budget rate
  - ✓ Only 1 project was a complete failure, one other (IRC decoupling project) still unknown
  - ✓ “Staff only” rate increased from 43% to 83%
- Customer (Reps. & Senators) rating May 2015
  - ✓ IT 4.7 out of 5 or 96%

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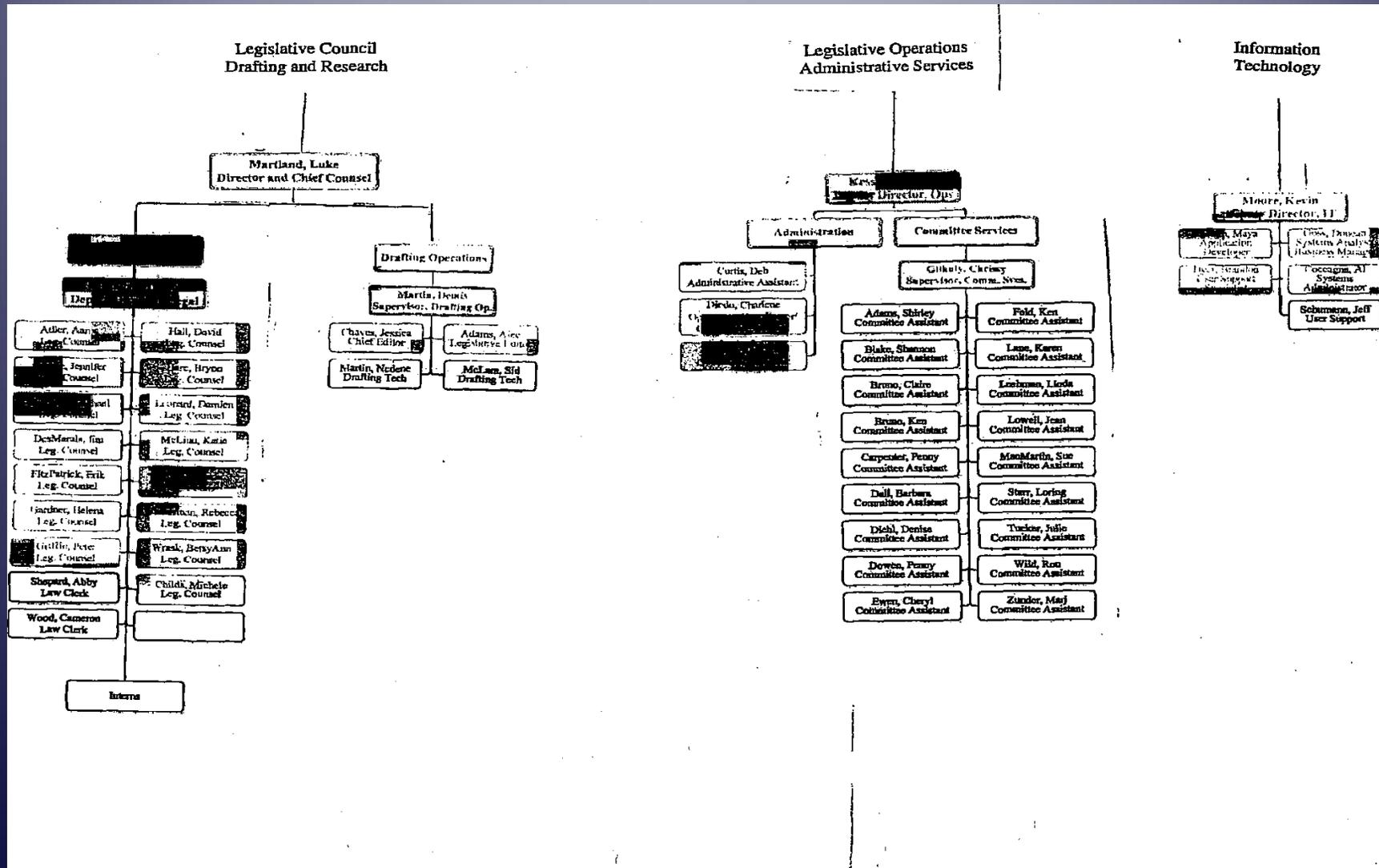
# Recommendations

- What matters most?
- What is the problem?
- If change statute or rule, creating a structure for the next 10 - 15 years

# Recommendations Concerning IT

- Retain & strengthen centralized IT
  - ✓ IT should be a new & independent office
  - ✓ Control over all IT staff, projects, consultants & services
- Streamline oversight
  - ✓ New IT office should report to one standing or oversight committee, similar to how Legislative Council is overseen by the Leg. Council Committee
  - ✓ Other offices should not oversee IT office

# Clerk's and Secretary's Proposal to Divide Legislative Council into Three Offices



# Recommendations Concerning Clerk's and Secretary's Proposal to Divide Legislative Council into Three Offices

- Reasons for proposal
  - ✓ “Any services which serve multiple staffing users should not be under the direction of one of the users and should be in a standalone unit” *(Memo John Bloomer, foundational principle)*
  - ✓ Historically IT & committee assistants separate

## Recommendations Concerning Clerk's and Secretary's Proposal to Divide Legislative Council into Three Offices

- Apply same two questions
  - ✓ What matters most?
  - ✓ What are the problems?
- Leg. Council, like IT, emphasizes business practices, quality & efficiency
  - ✓ Proposal will decrease efficiency – return to silos
  - ✓ More offices, increased cost?
- Questions as to proposal
  - ✓ Who included & why / why not?

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