

# Houston Information Technology Services (HITS)



Transportation, Technology and  
Infrastructure Committee  
June 19<sup>th</sup>, 2014 – 10AM

# AGENDA



## » Information & Cyber Security

» Network & Telephony Upgrades

» Data Center Consolidation



# Information & Cyber Security



## What have we done?

- » Policy – Executive Order 1.48
- » Citywide Education – TWO LEVELS
  - > Level 1: All Employees based on SANS Institute
  - > Level 2: Required for all IT Professionals
- » Several Vulnerability Assessments
- » Series of technology pilots

## What have we discovered?

- » We have vulnerabilities and gaps in processes that require short & long term attention
- » We need more information security policy, procedures and technology
- » We need citywide participation to ensure complete coverage



# Information & Cyber Security



## What should we do?

- » There are several Administrative Procedures in the Review/Approval Process
- » Continue technology pilots
- » Leverage technology pilots to expedite solution acquisition

## What are we asking for?

- » Support/Approve - the FTE in the FY15 HITS budget submission
- » Support/Approve - the CIP 2015-2019 item for Cyber Security
- » Challenge the Chief Information Security Officer (CISO), led by the CIO, to maintain the enterprise vision, strategy and information security program to ensure citywide information assets and technologies are adequately protected



# AGENDA



» Information & Cyber Security

» **Network & Telephony Upgrades**

» Data Center Consolidation



# Network, VOIP and Call Center Upgrade



## » Major Program Details

- > All existing antiquated systems will be replaced with new Voice over Internet Protocol (VoIP) technology
- > The upgrade includes over **385** locations citywide
- > Deployment of **134** network connection devices completed on **3/20/2014**
- > Planning for Enterprise Application integration initiated – Ongoing
- > Planning for **9,900** IP Phone deployment - Ongoing
- > Data Center Equipment being Deployed at both Data Centers so that full redundancy in Voice & Data will exist
- > Deployment of Session Initiation Protocol (SIP) Trunking lines replacing costly PRI's and T-1's - (SIP Vendor selection in process)



# Network, VOIP and Call Center Upgrade



## » Major Program Milestones – Continued

- Complete Call Manager with dial-tone scheduled for **7/17/2014**
- New Telephony Deployment to begin the week after Call Manager **7/25/2014**
- Contact Centers will be brought online in **August** and **September 2014**
  - 3-1-1 / BARC    PWE                      HHS
  - ARA                      HPL                      HPD
- All **9,900** IP Phones deployed – **Dec. 2014/Jan 2015**



# AGENDA



- » Information & Cyber Security
- » Network & Telephony Upgrades
- » **Data Center Consolidation**





# Data Center Consolidation



## Accomplishments:

- » Data Center build-out
  - > CyrusOne (managed data center provider)
    - + HPD cage – Complete with network infrastructure supporting Disaster Recovery for Records Management System (RMS)
    - + HITS space and network operational with 2x 10g circuits to Fannin, 1g to Lubbock and 1g internet link
    - + Backup Exchange (Email) moved to CyrusOne data center Friday, June 13
  - > 1301 Fannin
    - + Construction is complete
    - + 33 racks installed (tied together with cable trays and power)
    - + Network operational with 2x 10g circuits to C1 with 1g to Lubbock
    - + Voice upgrade slated to go live 19 June; 26 June, core VoIP upgrade



# Data Center Consolidation



## Milestones – next 6 months

- > Enterprise GIS move from HEC to Fannin – **June 20<sup>th</sup>**
- > 1200 Lubbock Exchange (primary Email) – **July 11<sup>th</sup>**
- > 1200 Lubbock data center to Fannin – **August 8-10<sup>th</sup>**
- > 611 Walker Systems /Applications to Fannin – **August 30<sup>th</sup>**
- > HHS, Library, FD (Dart), Parks move to Fannin – **Dec 31<sup>st</sup>**



# Data Center Consolidation



## Business benefit

- » Focus on **IT Core Services**
- » 24/7 monitored systems
- » Increased business continuity & reaction to disaster recovery incidents
- » Reduced energy costs in city owned buildings
- » Reduced departmental overhead costs to maintain “independent” data centers
- » Standardization across technology platforms



# Questions