



Phone System(PBX) Replacement Project



Agenda

- What is PBX?
- Collaboration Platform
- Microsoft Teams Calling
- Physical Phone Options
- What's Next?

What is PBX?

- Private Branch Exchange (PBX), aka our phone system
- Serves 7,000 analog phones and 3,600 VoIP phones
- Provide services for 3,500 voicemail boxes
- Risks today:
 - Outages due to age of equipment
 - Malicious security risks
 - Paying \$250k per year in maintenance





Microsoft Teams Collaboration Platform

A collaboration platform is a business and marketing concept describing the integration of enterprise communication services such as instant messaging (chat), presence information, voice (including IP telephony), mobility features (including extension mobility and single number reach), audio, web & video conferencing, integrated voicemail, e-mail, SMS and fax.





Project Cost Comparison

Item	Original 2019 Project Estimated Cost	Teams Project Estimated Cost
Equipment for infrastructure	\$347,698	\$189,000
Software/Licensing	\$382,000	\$115,000
Physical Phones	\$2,236,205	\$450,000*
Implementation/Consulting	\$1,480,466	\$182,000
Other Expenses	\$439,831	\$153,600
Total 1 Year Cost	\$5,186,200	\$1,089,600
Estimated 5 Year Cost	\$6,714,200	\$1,865,600

* Assumes 33% of all physical phones are replaced



- No additional cost
 - Domestic long distance is FREE
 - Phone functionality is included as part of Microsoft A5 licensing
 - No costly on campus equipment to maintain
- No more long-distance authorization codes
- The same number can be leveraged on up to 10+ different devices or clients (includes mobile application)
- Flexibility to make and receive call from computers, smart phones, or traditional style phone.
- Phone number privacy, eliminating need to release personal phone numbers
- Improved Voicemail Capabilities
 - Voicemails can be received as an email with the recording and transcription
 - Transcription to text visible within Teams soft phone client
- Ease of implementation
 - Many LSU faculty/staff/students are already leveraging Microsoft Teams



LSU

Collaboration Platform



Microsoft Teams Dialing

The screenshot displays the Microsoft Teams interface with the 'Calls' tab selected. On the left is a vertical navigation bar with icons for Activity, Chat, Teams, Calendar, Calls, Files, and Apps. The main area is divided into three sections:

- Dial Pad:** A numeric keypad with letters associated with each number (e.g., 1, 2 ABC, 3 DEF). Below the keypad is a 'Call' button and the work number '+1 (509) 670-0594'. A 'Parked calls' button is also visible.
- Recent Calls:** A list of recent calls with columns for contact name, duration, and time.

Contact	Duration	Time
Maria Johnson (Mobile)	7m 52s	5:20 PM
Hillary Reyes (Mobile)	8m 24s	4:13 PM
Will, Kayo, Eric, +2 (Mobile)	24m 43s	11:23 AM
Keiko Tanaka (Mobile)	7m 52s	9:20 AM
Eric Ishida (Mobile)	31m 52s	8:45 AM
+1 (509) 670-0594 (Mobile)	3m 53s	6/11
Design sync (Mobile)	7m 52s	6/11
Keiko Tanaka (Mobile)		6/11
Eric Ishida (Mobile)	1m 23s	6/11
Serena Davis (Mobile)	12m	6/10
Charlotte de Crum (Mobile)	30m 11s	6/10
Kadji Bell (Mobile)	7m 52s	6/10
Keiko Tanaka	9m 10s	6/10
- Call Details:** A panel for the selected call with Maria Johnson. It shows her profile (Manager at Fabricam), a 'Send a quick message' button, and the voicemail transcript: 'Hi Daniela, this is Maria from Fabricam. Can you please update me on my furniture delivery?'. A play button and a volume control slider are at the bottom.

At the bottom left, there are settings for 'Forwarding off' and 'Jabra Biz 2400'.



- Easy-to-use - user only needs a device with microphone and/or audio capabilities and the internet to begin communicating. Video calling accomplished if device includes a camera.
 - Compatible with any USB or Bluetooth headset
 - Flexibility and convenience – if you need to work remotely, the soft phone travels with you. Anyone can log into any device and have their instance of Teams available anywhere in the world.
- One-stop-shop for communication - Dialing is integrated with Microsoft Teams client, which also includes Teams file sharing, calendar, persistent chat, etc.
- Multiple contact options (within LSU campus contacts) - 578 number, name, or myLSU user ID
- Future-proof - upgrades are easy to install
- Secure - security protocols are handled at an enterprise level with no cost to the user
- Easy access to dial pad, recent calls, missed calls, favorites, and voicemail



Physical Phone

- These can be provided at a cost to the department. (Estimated price ranges: \$95-\$225)
- The goal would be to minimize the need for these phones. Use of a physical phone should be limited to common areas, individuals who need specific abilities that these phones provide, etc.





What's Next?

- The anticipated timeline for this implementation is winter 2021 through summer 2023.
- More details specific to departmental implementation timelines will be released in the near future.
- A spreadsheet will be sent to Department Heads and Cost Center Managers requesting updated phone details (see example on next slide).
 - Expected turnaround of 10 business days.
- During project rollout, any issues with existing Avaya phones will be resolved by deploying the Teams solution.



Phone Number	Is the Phone Needed?	Type of Phone Needed	System	Type	Location	Is the Location Correct?	Corrected Location	PCR Status	PCR Owner	Is the Owner Correct?
83675			Avaya	Analog	STUDENT AID TDD			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
46738			Avaya	Analog	ALLN 102			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
87986			Avaya	Analog	ALLN 102 ALARM			Active	CC00420: LSUAM Fin and Admin Service and Operations	
41723			Avaya	Analog	ALLN 121 HOTLINE			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
41153			Avaya	Analog	ALLN 123 Ring Down			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
41725			Avaya	Analog	ALLN 129 HOTLINE			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
41156			Avaya	Analog	ALLN 137 Ring Down			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46739			Avaya	Analog	ALLN 139			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
42065			Avaya	Analog	ALLN 139 Alarm Line			Active	CC00420: LSUAM Fin and Admin Service and Operations	
41558			Avaya	Analog	ALLN 19 HOTLINE			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46869			Avaya	Analog	ALLN 23			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46871			Avaya	Analog	ALLN 27			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46872			Avaya	Analog	ALLN 31			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46873			Avaya	Analog	ALLN 32 Hotline			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46874			Avaya	Analog	ALLN 34 Hotline			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46875			Avaya	Analog	ALLN 35			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
46876			Avaya	Analog	ALLN 36			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
45944			Avaya	Analog	ALLN 39 B - Alarm Line			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
41152			Avaya	Analog	ALLN 46 Ring Down			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
45305			Avaya	Analog	ALLN 51 Ring-down			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
42126			Avaya	Analog	ALLN 54 Ring-down			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
41150			Avaya	Analog	ALLN 55 Ring Down			Active	CC00423: LSUAM Fin and Admin Research and Educational Technology Services	
43756			Avaya	Analog	ART 106 Alarm Line			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
87971			Avaya	Analog	ASB Telecom Closet			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44045			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44059			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44065			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44070			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44071			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44085			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44092			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44094			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
44095			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
46360			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	
46361			Avaya	VOIP	ASSM Disaster Recovery			Active	CC00422: LSUAM Fin and Admin ASRM Telecommunications	



Frequently Asked Questions

- Common Areas? Conference rooms? Reception areas?
- How are we handling fax machines?
- Is teams 911 compliant?
- Emergency phones, what happens if we lose internet?
- Advanced call centers
- Training & Documentation

Questions