## Sangoma s400/s405 VolP Phone

## **Entry Level Device with Access** to Powerful Phone Applications

Designed to work with FreePBX and PBXact, Sangoma IP phones are so smart you can quickly and easily use them right out of the box.

The Sangoma s400 / s405 is a full feature set phone with three Session Initiation Protocol (SIP) accounts at a competitive price point. These phones can quickly locate FreePBX and/or PBXact to automatically and easily get full configuration right out of the box - true Zero Touch Configuration.

The s400 / s405 features industry standard Power over Ethernet, so no power cable or outlets required. It has full duplex speakerphone, five-way conference calling, high definition voice quality, and built in Virtual Private Network (VPN) capability.

"With Sangoma's family of IP phones & industry expertise, everything your business needs for IP & Unified Communications can be ordered from a single vendor. "

# Quick Facts

- 3x SIP Accounts
- 5-way Conferencing
- > 2.7 Inch Graphical LCD with Backlight
- 25 Programmable Soft Keys
- » EHS Support for Popular Wireless Headsets
- » Built-in VPN for Plug & Play Security for Remote Users
- Optional 3-year Advanced Hardware Replacement Plan

#### The Difference Between the s400 & s405

The s400 and s405 share all the same features and capabilities, with just one main difference:





» Dual-port 10/100 Mbps Ethernet

» Dual-port Gigabit Ethernet



Time Conditions















**Full Integration with Phone Apps** 

Call Flow

♠ SANGOMA

» Contacts



» Presence



**ADVANCED CAPABILITIES** 

for configuration.

**Zero Touch Provisioning** 

SANGOMA

**EndPoint Manager Included** 

firmware, and much more.

VoIP telephones can be complex to install, and manually configuring many different parameters and hundreds of

extensions can take hours. When you buy and install your

Sangoma IP phones, the redirection server automatically

points the phone to the Sangoma FreePBX and/or PBXact

Other vendors have redirection servers, but they have to be programmed with details of the IP PBX. Only Sangoma can provide Zero Touch provisioning with FreePBX / PBXact.

When using a Sangoma phone, EndPoint Manager software

lets your users control global settings, program their phone keys, map extensions, upload images, download new

Users can now control complicated features directly from

their phones. There's no need to remember feature codes.

inside FreePBX and PBXact is automatically enabled. This



















#### FEATURE SPECIFICATIONS

#### **Phone Features:**

- 3x SIP accounts
- » Call hold, mute, DND
- One-touch speed dial, hotline
- Call forward, call waiting, call transfer
- Redial, call return, auto answer
- 5-way conferencing
- » XML Browser

- » Direct IP call
- » Custom ring tones / provisioning
- » Set date time automatically or manually
- » Dial plan per account
- » RTCP-XR (RFC3611), VQ-RTCPXR (RFC6035)
- Action URL/URI

#### **IP-PBX Features:**

- » Busy Lamp Field (BLF)
- » Call park, call pickup
- Music on hold
- Voicemail
- » Anonymous call, anonymous call rejection
- » Message Waiting Indicator
- » Intercom, paging

#### **Voice Codecs Features:**

- » HD voice
  - > HD handset
  - > HD speaker
- » Codecs
  - > iLBC
  - > G.722
  - $> G.711(A/\mu)$
  - > GSM\_FR
  - > G.723
  - > G.729AB
  - > G.726 -32
- » Full-duplex hands-free speakerphone with AEC (Acoustic Echo Cancellation)

- » Voice Activity Detection (VAD)
- » Auto Gain Control (AGC)
- » Comfort Noise Generation (CNG)
- » Acoustic Echo Cancellation (AEC)
- » Packet Loss Concealment
- Adaptive Jitter Buffer (AJB)
- » DTMF
  - > In-band
  - > RFC 2833
  - > SIP INFO

#### **Display and Indicator:**

- » 2.7" 192 x 64 pixel greyscale graphical LCD with backlight
- » LED for call and message waiting indication
- Dual-color illuminated LEDs for line status information
- » Intuitive user interface with icons and soft keys
- » National language selection
- » Caller ID with name, number and photo

### **Feature Keys:**

- » 6 line keys with LED: 25 » Volume control keys various features (5-pageview)
- » 5 feature keys: menu, headset, speaker, mute, voicemail
- » 6 navigation keys
- >> 4 context-sensitive "soft" kevs
- » Illuminated voicemail, speaker, headset and mute keys

#### Interface:

- Ethernet
  - > s400: Dual-port 10/100 Mbps
  - > s405: Dual-port Gigabit
- » Power over Ethernet (IEEE 802.3af) (PoE), class 3
- » 1x RJ9 (4P4C) handset port
- Electronic Hook Switch (EHS) support for wireless headsets

#### Management:

- » Configuration
  - > Browser / LCD-Menu / auto-provision
- » Auto-provision via HTTP / HTTPS, FTP / TFTP
- » Auto-provision with PnP
- » Login / Logout (Hot-desking)
- » Reset to factory, restart, reboot
- » Local tracing log export, system log
- » Phone lock for personal privacy protection

#### **Network and Security:**

- » SIP v1 (RFC2543), v2 (RFC3261)
- » SIP server / proxy redundancy
- » NAT Traversal
  - > STUN mode
- » DHCP / static / PPPoE
- » HTTP / HTTPS web server
- » Time and date synchronization by SNTP
- » DNS-NAPTR/DNS- SRV (RFC 3263)
- » IEEE802.1X

- » QoS
  - > 802.1p/Q tagging (VLAN)
- > Layer 3 ToS DSCP
- » TLS (Transport Layer Security)
- » Built-in VPN (Based on Open VPN
- » HTTPS certificate manager
- » AES encryption for configuration file
- » Digest authentication using MD5/MD5-sess

#### Languages:

» English, French, German, Spanish, Portuguese, Russian, Italian, Polish, Turkish, Serbian, Chinese Simplified, Chinese Traditional, Slovenian, Farsi, Slovak and Czech

#### **Physical Features:**

- » Shipping dimensions
  - > 229mm (W) x 211mm (D) x 102mm (H)
- » Shipping weight
- > 1.27kgs (2.8lbs)
- » Wall mountable
- » Stand with 3 adjustable angles
- » Power consumption (PSU)
- » Power consumption (PoE) > 2.5~5.5W
- > 10~95%
- » Operating temperature
- **Optional Accessories:**
- » External universal AC adapter (US, UK, EUR)
  - > AC 100~240V input
  - > DC 5V/1.2A output

- > 2.0~4.6W
- » Operating humidity
- > -10~50°C
- » EHS headset adapter
- » Wall mount bracket

