

Unidata WPU-7700

About UniData

UniData Communications Systems, Inc. offer Wi-Fi phone and application based on stable VoIP solution technology. UniData which has the advantage of optimal customization for various customer's demands is to enjoy the better convenience of communication technology in both enterprise and home by the field-proven quality with a history for 10 years. We will be active partner of yours to enjoy the most advanced wireless communication technology and to create the higher productivity and value. For more information on UniData and its Wi-Fi solutions, visit www.udcsystems.com

Figure1. Unidata WPU-7700



UniData WPU-7700 is SIP-based Wi-Fi phone with the advantage of long-lasting battery, L2-L3 quick roaming and convenient management of auto provisioning during bootup sequence.

Preface

1. Revision History

No	DATE	DESCRIPTION	REMARK
1	2009-12-16	v.1.0.0	

Product Specifications

Table 1 lists the specifications, Table 2 the calling features, Table 3 the Wi-Fi features and specifications, and from table 4 to 6 standard of the Unidata WPU-7700.

Table 1. Product Specifications

Feature	Specifications
Protocol	Session Initiation Protocol(SIP) for Signaling
Codec	Voice Codec: <ul style="list-style-type: none"> • G.711 aLaw / G.711 uLaw / G.729AB • support Multiframe
Connectivity	802.11 b/g Wi-Fi
Physical dimensions	Dimensions <ul style="list-style-type: none"> • 5.5 x 1.9 x 0.9 in /13.8 x 4.8 x 2.2 cm Weight <ul style="list-style-type: none"> • 3.74oz/106g (with Battery) • 2.68oz/76g (without Battery)
Power	<ul style="list-style-type: none"> • Power supply input: 100~240 Vac, 50/60Hz • Power supply output: 5Vdc, 2A • Battery: Li-ion polymer 1250mAh
TEMPERATURE RANGE	<ul style="list-style-type: none"> • Operation: 32°F to 122°F / 0°C ~ 50°C • Relative humidity: 10%~85% • Storage temperature range: -20 ~ 70°C • Storage humidity range: 5 ~ 90%RH
Language support	English, Italian, Dutch, Spanish, Portuguese, Swedish, German, French, Danish
LCD	65K TFT color LCD 128 x 160 pixels
Key	Send, End, Cancel, 5-way navigation key, 4 soft keys, Number keypad(0 ~ 9, *, #)
Audio	MIC, Receiver, Speaker
CPU	Freescale MCF5249
Memory	8MB mobile SDRAM 16MB Flash
UNIDATA COMPLIANCE	KCC, FCC, CE, UL, JATE, VCCI, C-tick, RoHS

*Specifications are subject to change without notice.

Table 2. Calling Features

Features	Description
Calling feature	<ul style="list-style-type: none"> • Call mute • Call hold • Call transfer(attended/unattended/consultation) • Call waiting • Call forwarding(busy/no answer/unconditional) • Caller ID • Caller ID blocking • 3 way conference (dependant on SIP Proxy)*
Phone feature	<ul style="list-style-type: none"> • Polyphonic MIDI Ring / Vibration ringer • Simultaneous bell and vibration effects • Hotkey for vibration and ring toggling • Adjustable ringing and volume levels • Adjustable display brightness and timeout • 100 call history of inbound, outbound and missed call • 500 phone book with 30 grouping • 99 speed dial • Phone book search and during call • Phonebook file synchronization via Auto Provisioning Server • Last number redial • Support to setup hotkey • Call time • Time and date • Volume control • MWI • Alarm/Wakeup call • D-day (10) • World time (52 countries) • Location (52 countries) • Call progress tones (18 countries) • Calculator • Screen (background image, clock, calendar, user name) • Simple HTML browser (HTTP/HTTPS, Google mobile) • PC-Sync
Management	<ul style="list-style-type: none"> • Auto provisioning <ul style="list-style-type: none"> • Protocol: TFTP(default)/HTTP/HTTPS • Automatic boot-up provisioning <ul style="list-style-type: none"> - Association to default SSID when power up - Automatically routed to Auto provisioning server address from DHCP Bootp option 66 • Support file format <ul style="list-style-type: none"> - ini (general.ini for common / mac.ini for respective) • Configuration Items <ul style="list-style-type: none"> - Network / Wi-Fi / Security / SIP Proxy, Account / System setting (language, time, location) / Basic call • Latest version firmware upgrade • Manual Firmware upgrade <ul style="list-style-type: none"> • Upgrade F/W by phone menu from local server • Protocol: TFTP/HTTP/HTTPS • Web Server for phone book configuration • Web Configuration Tool • Administrator policy <ul style="list-style-type: none"> • Support admin password and user password separately • Admin menu is protected by admin password • SNTP Time Synchronization • Diagnosis <ul style="list-style-type: none"> • Network / WLAN / RTP / Ping Test / Hardware Diagnosis

Roaming	<ul style="list-style-type: none"> • Auto site scan (1~14 channels) • L2/L3 quick roaming by admin setting conditions • Support error rate roaming
Voice over IP	<ul style="list-style-type: none"> • Communication Protocol <ul style="list-style-type: none"> • RFC3261: SIP • SIP Proxy Redundancy (1st Proxy, 2nd Proxy) • Jitter Buffer • DTMF(Inbound/ RFC2833/ SIP INFO) • RTP/RTCP

* Able to develop upon request

Table 3. Wi-Fi Features and Specification

Feature	Specifications
Protocol	<ul style="list-style-type: none"> • IEEE 802.11b • IEEE 802.11g
Modulation	<ul style="list-style-type: none"> • 802.11b : DBPSK, DQPSK, CCK • 802.11g : BPSK, QPSK, 16-QAM, 64-QAM
Data Rate	IEEE 802.11b <ul style="list-style-type: none"> • 1,2,5.5, and 11 Mbps
	IEEE 802.11g <ul style="list-style-type: none"> • 6,9,12,18,24,36,48 and 54 Mbps
Frequency and Channel (*Regional Dependent)	IEEE 802.11 b/g: <ul style="list-style-type: none"> • Frequency: 2.400~2.497GHz • Channel: 1~11(FCC), 1~13(ETSI),1~14(Japan)
Output Power (*Regional Dependent)	<ul style="list-style-type: none"> • Typical 17dBm @802.11b • Typical 15dBm @802.11g
Rx Sensitivity	<ul style="list-style-type: none"> • Typical -94dBm@1Mbps • Typical -76dBm@11Mbps • Typical -65dBm@54Mbps
Antenna	Internal antenna
Security features	<ul style="list-style-type: none"> • WEP 64bits / 128 bits • WPA-PSK / WPA-EAP (WPA and WPA2) • 802.1x (EAP-MD5, EAP-TTLS, PEAP, EAP-TLS)
QoS	<ul style="list-style-type: none"> • WI-FI Multimedia (WMM) • DiffServ (Tos) Tagging • Jitter Buffer

Table 4. Communication Standard

RFC	Subject
RFC768	UDP (User Datagram Protocol)
RFC783	TFTP (Trivial File Transfer Protocol)
RFC791	IP (Internet Protocol)
RFC792	ICMP (Internet Control Message Protocol)

RFC793	TCP(Transmission Control Protocol)
RFC826	ARP (Address Resolution Protocol)
RFC 868	Time Protocol
RFC 1350	The TFTP Protocol (Revision 2)
RFC 1738	Uniform Resource Locators (URL)
RFC3559	NTP (Network Time Protocol version 3)
RFC1889	RTP(A Transport Protocol for Real-Time Applications)
RFC1945	HTTP (Hyper Text Transfer Protocol)
RFC 1769	Simple Network Time Protocol
RFC2131	DHCP (Dynamic Host Configuration Protocol)
RFC2284	EAP (PPP Extensible Authentication Protocol)
RFC2782	A DNS RR for specifying the location of services (DNS SRV)
RFC2327	SDP (Session Description Protocol)
RFC2616	HTTP/1.1
RFC2833	RTP Payload for DTMF Digits, Telephony Tones and Telephony Signals
RFC2976	The SIP INFO Method
RFC3261	SIP (Session Initiation Protocol)
RFC3262	Reliability of Provisional Responses in the Session Initiation Protocol
RFC3263	Session Initiation Protocol (SIP): Locating SIP Servers
RFC3264	An Offer/Answer Model with the Session Description Protocol (SDP)
RFC3265	Session Initiation Protocol (SIP)-Specific Event Notification
RFC3310	Hypertext Transfer Protocol (HTTP) Digest Authentication Using Authentication and Key Agreement (AKA)
RFC3323	A Privacy Mechanism for the Session Initiation Protocol
RFC3325	Private Extensions to the Session Initiation Protocol for Asserted Identity within Trusted Networks
RFC3428	Session Initiation Protocol (SIP) Extension for Instant Messaging
RFC3515	The Session Initiation Protocol (SIP) Refer Method
RFC3550	RTP: A Transport Protocol for Real-Time Applications
RFC3581	An Extension to the Session Initiation Protocol (SIP) for Symmetric Response Routing
RFC3842	A Message Summary and Message Waiting Indication Event Package for the Session Initiation Protocol (SIP)
RFC3891	The Session Initiation Protocol (SIP) "Replaces" Header
RFC4028	Session Timers in the Session Initiation Protocol (SIP)

Table 5. QoS(Quality of Service)

RFC	Subject
IEEE 802.1p	Traffic Class Expediting and Dynamic Multicast Filtering
IEEE 802.1Q	Virtual LANs
RFC 1349	Type of Service in the Internet Protocol Suite
RFC 2474	Definition of the Differentiated Services Field (DS Field) in the IPv4 and IPv6 Headers

Table 6. NAT Traversal

RFC	Subject
RFC 3581	An Extension to the Session Initiation Protocol (SIP) for Symmetric Response Routing
RFC 3489	STUN - Simple Traversal of User Datagram Protocol (UDP) Through Network Address Translators (NATs)