



# **System Capacity**

## **Maximum Trunk and Extension Cards**

The following number of trunk and extension cards can be installed in the Hybrid IP-PBX for expansion.

KX-TDA100D
7*1
7
7

\*1 One T1, E1, PRI30, PRI23, or IP-GW4 card counts as 2 cards.

### **Maximum Terminal Equipment**

The following number of items of terminal equipment can be supported by the PBX.

Terminal Equipment Type	Maximum Number
Telephone	176*1
SLT	128
KX-DT300/KX-T7600 series DPT	104
IP-PT	112
DSS console	8
CS	26
High-density CS	13
PS	128
Voice Processing System (VPS)	2
Doorphone	16
Door Opener	16
External Sensor	16
External Relay	16

\*1 When the PBX is equipped with 104 DPTs (Digital XDP), 48 IP-PTs, and 24 SLTs.

# **Option List**

Category Model No.			Description		
<b>DMPR Option</b>	Card	KX-TDA0196	Remote Card (RMT)		
Trunk Cards		KX-TDA0180	8-Port Analogue Trunk Card (LCOT8)		
		KX-TDA0181	16-Port Analogue Trunk Card (LCOT16)		
		KX-TDA0182	8-Port DID Card (DID8)		
		KX-TDA0183	4-Port Analogue Trunk Card (LCOT4)		
		KX-TDA0184	8-Port E & M Trunk Card (E&M8)		
		KX-TDA0187	T-1 Trunk Card (T1)		
		KX-TDA0188	E-1 Trunk Card (E1)		
		KX-TDA0189	8-Port Caller ID/Pay Tone Card (CID/PAY8)		
		KX-TDA0193	8-Port Caller ID Card (CID8)		
		KX-TDA0284	4-Port BRI Card (BRI4)		
		KX-TDA0288	8-Port BRI Card (BRI8)		
		KX-TDA0290CE/CJ	PRI Card (PRI30)		
		KX-TDA0290	PRI Card (PRI23)		
		KX-TDA0484	4-Channel VoIP Gateway Card (IP-GW4E)		
		KX-TDA0490	16-Channel VoIP Gateway Card (IP-GW16)		
		KX-TDA1180	8-Port Analogue Trunk Base Card with Caller ID(CLCOT8)		
		KX-TDA1186	8-Port Analogue Trunk Daughter Card with Caller ID(CLCOT8E)		
Extension Car	ds	KX-TDA0143	4 Cell Station Interface Card(CSIF4)		
		KX-TDA0144	8 Cell Station Interface Card(CSIF8)		
		KX-TDA0171	8-Port Digital Extension Card (DLC8)		
		KX-TDA0172	16-Port Digital Extension Card (DLC16)		
		KX-TDA0470	16-Channel VoIP Extension Card (IP-EXT16)		
		KX-TDA1176	16-Port Single Line Telephone Extension with Caller ID and Message Lamp Card(MCSLC16)		
		KX-TDA1178	24-Port Single Line Telephone Extension with Caller ID and Message Lamp Card(MCSLC24)		
Other Cards		KX-TDA0161	4-Port Doorphone Card (DPH4)		
		KX-TDA0162	2-Port Doorphone Card (German Type)(DPH2)		
		KX-TDA0164	4-Port External Input/Output Card (EIO4)		
		KX-TDA0166	16-Channel Echo Canceller Card (ECHO16)		
		KX-TDA0190	Optional 3-Slot Base Card (OPB3)		
		KX-TDA0191	4-Channel Message Card (MSG4)		
		KX-TDA0192	2-Channel Simplified Voice Message Card (ESVM2)		
		KX-TDA0194	4-Channel Simplified Voice Message Card (ESVM4)		
		KX-TDA0410	CTI Link Card (CTI-LINK)		
Optional SD Mer	nory Card	KX-TDA0920	SD Memory Card for Software Upgrade to Enhanced Version		
Cell Stations	DECT	KX-TDA0155	2-Channel Cell Station Unit Using a DLC Card (PT-interface CS) for DECT Portable Station		
(CSs)		KX-TDA0156	4-Channel Cell Station Unit Using a CSIF Card for DECT Portable Station		
		KX-TDA0158	8-Channel High-density Cell Station Unit Using a DLC Card (PT-interface CS) for DECT Portable Station		
Proprietary		KX-A228	Back-up Battery Cable		
Equipment		KX-A258	Blank Slot Cover		
		KX-T30865	Doorphone		
		KX-T7765	Doorphone		



**KX-TDA100D** 

## **Specifications**

КХ-ТД	A100D					
Control Bus: Original bus (16-bit, 8 MHz, 10 megabytes per second)						
Communication Bus: H.100 bus conformity (1024 time slots)						
Switching: Non-blocking						
<b>Power Input:</b> 100 V AC to 130 V AC; 2.8 A/200 V AC to 240 V AC; 1.7 A; 50 Hz/60 Hz						
External Battery: +36 V DC (+12 V DC x 3, recommended maximum capacity is 28 Ah)						
Maximum Power Failure Tolerance: 300 ms (without using backup batteries)						
Memory Backup Duration: 7 years						
Dialling:        Trunk      Dial Pulse (DP)10 pps, 20 pps Tone (DTMF) Dialling        Extension      Dial Pulse (DP)10 pps, 20 pps Tone (DTMF) Dialling						
Mode Conversion: DP-DTMF.DTMF-DP						
Ring Frequency: 20 Hz/25 Hz (selectable)						
Trunk Loop Limit: 1600 Ω maximum						
Operating Environment: Temperature 0°C to 40°C Humidity 10 % to 90 % (non-condensing)						
Conference Call Trunk: From 10 x 3-party conference call to 4 x 8-party conference call						
Music on Hold (MOH): 2 ports (Level Control11 dB to +11 dB in 1 dB steps) MOH1:External Music Source port MOH2:Selectable Internal/External Music Source port						
Paging: Internal Level Control:-15 dB to +6 dB in 3 dB steps External 2 ports (Volume Control:-15 dB to +15 dB in 1 dB steps)						
Serial Interface Port: RS-232C 1 (maximum 115.2 kbps USB 1	5)					
Extension Connection Cable: SLT DPT PT-interface CS PT-interface CS (High-density) DSS Console and Add-on Key Module	1-pair wire (T, R) 1-pair wire (D1, D2) or 2-pair wire (T, R, D1, D2) 1-pair wire (D1, D2) 4-pair wire (D1, D2) 1-pair wire (D1, D2)					
<b>Dimension:</b> 334 mm (W) x 390 mm (H) x 270 m						
Weight (when fully mounted):	Under 12 kg					

Compatible Panasonic Proprietary Telephones The PBX supports the following telephones: • Digital proprietary telephones (e.g., KX-DT300 series) • IP proprietary telephones (e.g., KX-TT300 series) • Portable stations (e.g., KX-TCA355, KX-TCA256) • DSS consoles (e.g., KX-DT390) • Single line telephones (e.g., KX-T7710) Incompatible Panasonic Proprietary Telephones In PEPX does not support the following telephones: • KX-T7400 series digital proprietary telephones • KX-T7500 series digital proprietary telephones • Analogue proprietary telephones(e.g., KX-T700 series) • KX-T30800 series proprietary telephones and DSS consoles

Some models will be available to limited Countries.

# System Feature Capacity

	ltem	KX-TDA100D		ltem	KX-TDA100D
	Absent Message-Extension	1 x 16 characters		Routing Plan Table	16 entries
	Absent Message-System	8 x 16 characters	ARS	Leading Number Table	16 digits, 1,000 entries
	Call Park Zone	100		Leading Number Exception Table	16 digits, 200 entries
	Conference	3-8 parties per conference (32 parties total)		ARS Carrier	10
	COS	64		Itemised Billing Code	10 digits
	DID/DDI Table	32 digits, 1,000 entries		Authorisation Code for Tenant	16 digits
	Extension Number	1-5 digits (1-4 digits for PSs)		Authorisation Code for Trunk Group	10 digits
	Extension Personal Identification Number (PIN)	10 digits, 1 entry/extension	Call Log and	Outgoing Call Log - PT Outgoing Call Log - PS	100 records/extn. 1,520 records/system 100 records/extn. 640 records/system
	Host PBX Access Code	10 digits, 10 entries/trunk group		Incoming Call Log - PT	100 records/extn. 3,040 records/system
	Multiple Subscriber Number (MSN)	10 entries per ISDN-BRI port		Incoming Call Log - PS +	100 records/extn. or group
	Number of the Characters of Name	20	Message	Incoming Call Distribution Group	Total 2,048 records/system
/stem	Printing Message	8	Waiting	Message Waiting - PS + Incoming Call Distribution Group	256
	Queuing Time Table	64			
	Ring Tone Pattern Plan	8		Message Waiting - PT + SLT	512
		one system programmer + 63 personal programmers		Outgoing Message (OGM)	64
	Simultaneous Programmers	one manager programmer + 63 personal programmers  of personal programmers	Voice Message	OGM Total Recording Time	MSG4 Card: 8 minutes; ESVM2/ESVM4 Card: 20 minutes (at High recording quality)
	SMDR Call Storage	2500 calls		Built-in Simplified Voice Message (SVM)	ESVM2/ESVM4 Card: 250 messages per card/block
	Special Carrier Access Code	16 digits, 20 entries			ESVM2/ESVM4 Card: 20, 60, or 120 minutes
	Tenant	8		SVM Total Recording Time	(depending on the recording quality)
	Time Service Holiday	24	Hernitelity	Billing items for guest rooms	2,500 records/PBX
	Verification Code	4 digits, 1,000 entries	Hospitality and Charge	Hotel Operator	4
	Verification Code Personal	10 digits, 1,000 entries	Management	Charge Rate	7 digits including a decimal
	Identification Number (PIN)	TO digits, 1,000 entries	Features	Charge Denomination	3 currency characters/symbols
	Emergency Call	32 digits, 10 entries		TIE Line Routing and Modification Table	32 entries
	Hot Line	32 digits		Leading Number	3 digits
	Key Pad Protocol Dial	32 digits	Networking	PBX Code	7 digits
	(ISDN Service Access)	52 digits		NDSS: Monitored PBXs	8
ialling	Personal Speed Dialling	32 digits, 100 entries/extn.		NDSS: Registered Extensions	250
	Quick Dialling	4080 entries (80: basic memory [4 digits],		for Monitor PBX	230
	Quick Dialing	4000: expansion memory [8 digits])	сті	PC Console	8
	Redial	32 digits	CII	PC Phone	64
	System Speed Dialling	32 digits, 1,000 entries/tenant		System Password for Installer	4 - 10 characters
	Broadcasting Group	8 (32 members/group)	Password	System Password for Administrator —	4 - 10 characters
	Call Pickup Group	64		for PC Programming	- To characters
	Idle Extension Hunting Group	64 (16 extensions/group)		System Password for User —	4 - 10 characters
	Incoming Call Distribution Group	128 (32 extensions/group)		for PC Programming	
oups	Paging Group	32		System Password for Administrator —	4 - 10 digits
	PS Ring Group	32		for PT Programming	
	Trunk Group	64		System Password for User —	
	VM (DPT) Group	2 groups x 12 ports (24 channels)		for PT Programming	3
	VM (DTMF) Group	2 groups x 32 channels		Manager Password	4 - 10 digits
TRS/ Barring	TRS/Barring Level	7	Pro- grammer Code	Installer Level Programmer Code	4 - 16 characters
	TRS/Barring Denied Code	16 digits, 100 entries/level		Administrator Level Programmer Code	4 - 16 characters
	TRS/Barring Exception Code	16 digits, 100 entries/level		User Level Programmer Code	0 - 16 characters

# **Features List**

## 1. Call Handling Features

- Incoming Call Features Incoming Trunk Call Features Direct In Line (DIL) Direct Invard Dialing (DD)/Direct Dialling In (DDI) Multiple Subscriber Number (MSN)
- Multiple Subscriber Number (MSN) Ringing Service
  Calling Line Identification (CLI) Distribution
  Intercept Routing
  Intercept Routing-No Destination
  Internal Call Floatures
  Internal Call Block
  Inservice Call Undisting Features

Incoming Call Indication Features • Ring Tone Pattern Selection • Call Waiting

- Receiving Group Features Idle Extension Hunting Incoming Call Distribution Group Features Group Call Distribution Outside Destinations in Incoming Call Distribution Group

- Ouerflow Feature
  VIP Call
  Overflow Feature
  Log-in/Log-out
  Supervisory Feature
- Call Forwarding (FWD)/ Do Not Disturb (DND) Features
- Call Forwarding (FWD)
  Do Not Disturb (DND)
  FWD/DND Button, Group FWD Button

Answering Features Line Preference-Incoming Call Pickup Hands-free Answerback Making Call Features Predialling Automatic Extension Release Intercom Call Trunk Call Features

- Emergency Call
  Account Code Entry
  Dial Type Selection
  Reverse Circuit
  Trunk Busy Out
  Deverse Lise reference

- Pause Insertion

rause insertion
 Host PBX Access Code (Access Code to the
 Telephone Company from a Host PBX)
 Special Carrier Access Code
 Seizing a Line Features
 Line Preference - Outgoing
 Trunk Access

Memory Dialling Features • One-Touch Dialling • KX-T7710 One - touch Dialling • Last Number Redial

 Speed Dialling - Personal/System
 Quick Dialling Hot Line Primary Directory Number (PDN)/ Secondary Directory Number (SDN) Features Busy Line/Busy Party Features Automatic Callback Busy (Camp-on) Executive Busy Override Call Monitor Second Call Notification to Busy Extension • Call Waiting Tone • Off-hook Call Announcement (OHCA) • Whisper OHCA Toll Restriction (TRS)/ Toll Restriction (TRS)/ Call Barring (Barring) Features Budget Management Extension Dial Lock Dial Tone Transfer Walking COS Verification Code Entry Automatic Route Selection (ARS) Features Conversation Features Hands-free Operation Off-hook Monitor Mute Headset Operation Data Line Security Flash/Recall/Terminate External Feature Access (EFA) Trunk Call Limitation Paralleled Telephone Calling Party Control (CPC) Signal Detection Transferring Features Call Transfer Holding Features Call Hold Call Park Call Splitting Music on Hold **Conference Features**  Conference
 Privacy Release Paging Features Broadcasting Features Optional Device Features Doorphone Call Door Open Trunk Answer From Any Station (TAFAS) Irunk Answer From Any Station (TAFAS) Background Music (BGM) Outgoing Message (OGM) Direct Inward System Access (DISA) Automatic Fax Transfer Built-in Simplified Voice Message (SVM) External Sensor External Relay Control

Caller ID Features Caller ID Incoming Call Log Message Features Message Waiting Absent Message Proprietary Telephone (PT) Features Fixed Buttons Flexible Buttons LED Indication Display Information Display Information Integrated Services Digital Network (ISDN) Service Features • Calling/Connected Line Identification Presentation (CLIP/COLP) • Advice of Charge (AOC) • Call Forwarding (CF) - by ISDN (P-MP) • Call Forwarding (CF) - by ISDN (P-P) • Call Transfer (CT) - by ISDN • Call Transfer (CT) - by ISDN • Three-party Conference (3PTY) - by ISDN • Malicious Call Identification (MCID) • Completion of Calls to Busy Subscriber (CCBS) (CCBS) ISDN Extension
 ISDN Service Access by Keypad Protocol E1 Line Service Features **T1 Line Service Features** Voice Mail Features Voice Mail (VM) Group Voice Mail DTMF Integration Voice Mail DPT (Digital) Integration Portable Station (PS) Features Portable Station (PS) Connection PS Ring Group PS Directory PS Feature Buttons Wireless XDP Parallel Mode Virtual PS Administrative Information Features Station Message Detail Recording (SMDR) Printing Message Call Charge Services Hospitality Features Room Status Control Call Billing for Guest Room Extension Controlling Features Extension Personal Identification Number (PIN) Extension Feature Clear Walking Extension Timed Reminder Audible Tone Features Dial Tone Confirmation Tone

#### Networking Features

Networking Features TIE Line Service Voice over Internet Protocol (VoIP) Network Virtual Private Network (VPN) QSIG Standard Features • Calling/Connected Line Identification Presentation (CLIP/COLP) and Calling/Connected Name Identification Presentation (CNIP/CONP) - by QSIG • Call Econvariang (CF), by QSIG Presentation (CNIP/-CONP) - by QSIG - Call Forwarding (CF) - by QSIG - Call Transfer (CT) - by QSIG - Completion of Calls to Busy Subscriber (CCB3) - by QSIG QSIG Enhanced Features OSIG Enhanced Features - Network Direct Station Selection (NDSS) - Centralised Voice Mail Network ICD Group - PS Roaming by Network ICD Group IP Proprietary Telephone (IP-PT) Features IP Proprietary Telephone (IP-PT) Computer Telephony Integration (CTI) Features Computer Telephony Integration (CTI) PC Phone/PC Console **Cellular Phone Features** 2. System Configuration and

# **Administration Features**

System Configuration - Hardware Extension Port Configuration System Configuration - Software Class of Service (COS) Group Tenant Service Time Service Operator Features Manager Features Manager Features System Data Control PC Programming PT Programming Password Security Quick Setup Automatic Setup Flexible Numbering/Fixed Numbering Floating Extension Software Upgrading Fault Recovery/Diagnostics Power Failure Transfer Power Failure Restart Local Alarm Information

Some models will be available to limited Countries. Design and specifications subject to change without notice.