USER MANUAL

VERSION 4.0 March 2019

TP/TM-XX40 Panel PC Hardware System



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Safety

IMPORTANT SAFETY INSTRUCTIONS

- 1. To disconnect the machine from the electrical power supply, turn off the power switch and remove the power cord plug from the wall socket. The wall socket must be easily accessible and in close proximity to the machine.
- 2. Read these instructions carefully. Save these instructions for future reference.
- 3. Follow all warnings and instructions marked on the product.
- 4. Do not use this product near water.
- 5. Do not place this product on an unstable cart, stand, or table. The product may fall, causing serious damage to the product.
- 6. Slots and openings in the cabinet and the back or bottom are provided for ventilation to ensure reliable operation of the product and to protect it from overheating. These openings must not be blocked or covered. The openings should never be blocked by placing the product on a bed, sofa, rug, or other similar surface. This product should never be placed near or over a radiator or heat register or in a built-in installation unless proper ventilation is provided.
- 7. This product should be operated from the type of power indicated on the marking label. If you are not sure of the type of power available, consult your dealer or local power company.
- 8. Do not allow anything to rest on the power cord. Do not locate this product where persons will walk on the cord.
- 9. Never push objects of any kind into this product through cabinet slots as they may touch dangerous voltage points or short out parts that could result in a fire or electric shock. Never spill liquid of any kind on the product.
- 10.The Clinical PC can be cleaned in accordance with normal clinical cleaning practices, including wiping with water or medical grade wipes, provided no substance containing acids or cleaning alkali liquids is used.
- 11.Medical grade wipes must not contain more than 80% alcohol content measured against the total content of the wipe.

Sécurité

INSTRUCTIONS IMPORTANTES RELATIVES À LA SECURITE

- 1. Pour débrancher la machine de l'alimentation électrique, éteignez l'interrupteur d'alimentation et retirez le cordon d'alimentation de la prise murale. La prise murale doit être facilement accessible et à proximité de la machine.
- 2. Lisez attentivement ces instructions. Conservez ces instructions pour une référence future.
- 3. Suivez tous les avertissements et les instructions indiquées sur le produit.
- 4. Ne pas utiliser ce produit à proximité de l'eau.
- 5. Ne pas placer ce produit sur un chariot, un support ou une table. Le produit peut tomber, causant de graves dommages à l'appareil.
- 6. Les fentes et les ouvertures dans le boîtier, l'arrière ou le fond sont prévues pour la ventilation afin d'assurer un fonctionnement fiable du produit et le protéger de la surchauffe. Ces ouvertures ne doivent pas être obstruées ou couvertes. Les ouvertures ne doivent jamais être bloquées en plaçant l'appareil sur un lit, un canapé, un tapis ou autre surface similaire. Ce produit ne doit jamais être placé : à proximité ou sur un radiateur, sur un registre de chaleur ou dans une installation intégrée à moins qu'une ventilation adéquate soit prévue.
- 7. Ce produit doit être utilisé avec le type d'alimentation indiqué sur l'étiquette.Si vous n'êtes pas sûr du type d'alimentation disponible, consultez votre revendeur ou représentant local de l'entreprise.
- 8. Ne laissez rien reposer sur le cordon d'alimentation. Ne placez pas ce produit là oùdes personnes peuvent marcher sur le cordon.
- 9. N'introduisez jamais d'objets d'aucune sorte dans ce produit à travers les fentes du coffret car ils pourraient entrer en contact avec des points sous tension dangereux ou court-circuiter des pièces. Ne renversez jamais de liquide d'aucune sorte sur le produit.

C C CE MARK

This device complies with the requirements of the EEC directive 2014/30/EU with regard to "Electromagnetic compatibility" and 2014/35/EU "Low Voltage Directive".

FC FCC

This device complies with part 15 of the FCC rules. Operation is subject to the following two conditions:

(1) This device may not cause harmful interference.

(2) This device must accept any interference received, including interference that may cause undesired operation.

CAUTION ON LITHIUM BATTERIES

There is a danger of explosion if the battery is replaced incorrectly. Replace only with the same or equivalent type recommended by the manufacturer. Discard used batteries according to the manufacturer's instructions.



Battery Caution

Risk of explosion if battery is replaced by an incorrectly type. Dispose of used battery according to the local disposal instructions.



Safety Caution

Note: To comply with IEC60950-1 Clause 2.5 (limited power sources, L.P.S) related legislation, peripherals shall be 4.7.3.2 "Materials for fire enclosure" compliant.

4.7.3.2 Materials for fire enclosures

For MOVABLE EQUIPMENT having a total mass not exceeding 18kg.the material of a FIRE ENCLOSURE, in the thinnest significant wall thickness used, shall be of V-1 CLASS MATERIAL or shall pass the test of Clause A.2.

For MOVABLE EQUIPMENT having a total mass exceeding 18kg and for all STATIONARY EQUIPMENT, the material of a FIRE ENCLOSURE, in the thinnest significant wall thickness used, shall be of 5VB CLASS MATERIAL or shall pass the test of Clause A.1

AVERTISSEMENT SUR LES BATTERIES AU LITHIUM

Il y a un danger d'explosion si la batterie n'est pas remplacée correctement. Remplacez-la uniquement par une batterie identique ou de type équivalent recommandée par le fabricant.les batteries usagées doivent être mises au rebut conformément aux instructions du fabricant.



Avertissement Batterie

Risque d'explosion si la batterie est remplacée par un élément incompatible. Jetez les batteries usagées selon les instructions des dispositions locales .



Avertissement de sécurité

Remarque: Pour répondre à la norme IEC60950-1 alinéa 2.5 (sources d'énergie limitées, LPS) liés la législation, les périphériques doivent être conforme 4.7.3.2 "Matériaux pour enceinte coupe-feu»

4.7.3.2 "Matériaux pour équipements coupe-feu»

Pour les équipements mobiles ayant une masse totale n'excédant pas 18kg : Les matériaux d'un équipement coupe-feu, dans l'épaisseur de paroi retenue la plus significativement mince, doivent être des matériels de CLASSE V-1 ou doivent passer le test de l'article A.2. Pour équipements mobiles ayant une masse totale supérieure à 18 kg et pour tous les équipements FIXES :

Les matériaux d'un équipement coupe-feu dans l'épaisseur de paroi retenue la plus significativement mince, doivent être des matériels de CLASSE V-1, doivent être de classe Matériel 5VB ou doivent passer le test de l'article A.1

LEGISLATION AND WEEE SYMBOL

2012/19/EU Waste Electrical and Electronic Equipment Directive on the treatment, collection, recycling and disposal of electric and electronic devices and their components.



The crossed dust bin symbol on the device means that it should not be disposed of with other household wastes at the end of its working life. Instead, the device should be taken to the waste collection centers for activation of the treatment, collection, recycling and disposal procedure.

To prevent possible harm to the environment or human health from uncontrolled waste disposal, please separate this from other types of wastes and recycle it responsibly to promote the sustainable reuse of material resources.

Household users should contact either the retailer where they purchased this product, or their local government office, for details of where and how they can take this item for environmentally safe recycling.

Business users should contact their supplier and check the terms and conditions of the purchase contract.

This product should not be mixed with other commercial wastes for disposal.

Revision History

Changes to the original user manual are listed below:

Revision	Description	Date
1.0	Initial release	April 2011
1.1	 IdeaCom touch driver installation added 	June 2011
1.2	3040 MB added	March 2012
1.3	2040 MB added	June 2012
1.4	2040 MB added1540 MB and 2040 MB removed	June 2013
2.0	 Add the French language of the Safety, Warning & Caution in the page iii~v 	January 2014
2.1	• Add 3040 MB	September 2014
2.2	2040 MB removed4040 MB added	July 2015
2.3	 Remove RJ11 port and relevant setting from 4040 and 3040 MB 	December 2015
3.0	5040 MB added	November 2016
3.1	Important safety instruction updated	March 2017
4.0	3040 MB removed5040 MB added	March 2019

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1-1. Standard Items



- a. System
- b. Power adapter
- c. Power cord
- d. RJ45-DB9 cable (x2)
- e. Driver bank

Note: Power cord will be supplied differently according to various region or country.

1-2. Optional Items



MSR





- 2. Built-in web cam
- 4. MSR cable hole

2-2. Rear View



- 5. VESA mounting holes
- 6. Cable cover
- 7. Safety label

2-3. I/0 view

3040 Motherboard



Item No.	Description		
а	Mic in		
b	Line out		
С	COM4		
d	2 nd LAN		
е	USB 2.0(x4)		
f	COM port 1, 2, 3 (from left to right)		
g	VGA		
h	DC in		
i	Power button		
j	DVI-D		
k	HDD slot		
I	LAN		
m	USB 3.0(x2)		

*The location of the DVI port for K757 IO bracket is displayed as the red circle marked in the above figure.

4040 Motherboard



Item No.	Description
а	Mic in
b	Line out
С	COM4
d	2 nd LAN
е	USB 2.0(x4)
f	COM port 1, 2, 3 (from left to right)
g	VGA
h	DC in
i	Power button
j	DVI-D (option)
k	HDD slot
	LAN
m	USB 3.0 (x1)

5040 Motherboard



Item No.	Description
а	Mic in
b	Line out
С	COM4
d	2 nd LAN
е	USB 2.0(x2)
f	LAN
g	COM port 1, 2, 3 (from left to right)
h	VGA
i	DC in
j	Power button
k	DVI-D
I	HDD slot
m	USB 3.0(x4)

5040 Motherboard



Item No.	Description		
а	VGA		
b	2 nd LAN		
С	USB 2.0(x2)		
d	Mic in		
е	Line out		
f	USB 3.0(x4)		
g	COM port 1, 2 (from left to right)		
h	HDMI		
i	DC in		
j	Power button		
k	HDD slot		
I	LAN		

2-4. Dimensions

2-4-1. 15.6" System



2-4-2. 18.5" System



2-4-3. 21.5" System



3. System Assembly

3-1. Open the Chassis Cover

The motherboard and RAM module can be replaced by opening the chassis cover, which is located on the back side of the system. Please follow the steps below to open the chassis cover.

1. Turn to the back side of the system and loosen the screws (x2) to release the cable cover first.



2. Loosen the screws (x8) to open the back cover of the system.



3-2. RAM Module Replacement

To remove and replace the RAM module, please open the chassis cover firstly as steps dscribed in chapter 3-1.

Removing a RAM module

1. Find the memory slot at the right side of the motherboard.



2. Flip the ejector clips outwards to remove the memory module from the memory slot.



Installing a RAM moudle

3. Slide the memory module into the memory slot and press down until the ejector clips snaps in place.



3-3. HDD Replacement

To remove and replace the HDD, please open the cable cover firstly as stpes dscribed in chapter 3-1-1.

1. Find the HDD located at the right side.

2. Pull the HDD tray from the system. For easier removal pull the plastic sheet (see picture) at the same time.





- 3. Attach the HDD to the HDD tray and slide it into the slot until it snaps in place.
- * Please note the top of the HDD should be on the upper side.





4. Specification

Model Name	TP-3040				
Mainboard		3040			
	Intel Haswell CPU, LGA 1150pins, 22nm				
	i7-4770TI	i7-4770TE 2.3G(Turbo 3.3G), LLC 8M, 45W			
	i5-4570TI	E 2.7G(Turbo 3.3G), LLC	4M, 35W		
	i3-4	330TE 2.4G, LLC 3M, 3	ōW		
	Pentiun	n G3320TE 2.3G, LLC 3N	/l, 35W		
	Celeror	n G1820TE 2.2G, LLC 2M	1, 35W		
Chipset	Intel Lyn>	Point PCH Q87(AMT tec	hnology)		
System Memory	S.O.DIMM x1, FS	B 1333/1600MHz, defa	ult 2G, max. 8G		
Graphic Memory	Intel HD Graphics/H	D Graphics 4600, integr	ated in CPU, DX11.1		
LAN controller (Giga LAN)	Intel I218LM (Pr	ny), 2nd LAN Realtek 811	1E (F40 board)		
Audio controller		Realtek ALC662VD0-GR			
Super I/O controller		Winbond W83627UHG			
LVDS controller		NXP PTN3460			
BIOS		Phoenix UEFI			
Touch controller		Elo coach V (USB)			
TPM controller	٩	NUVOTON TPM NPCT 420			
LCD/Touch Panel					
LCD Size	15.6" LED LCD	18.5" LED LCD	21.5" LED LCD		
Brightness	220 nits	250	nits		
Maximal Resolution	1366	x 768	1920 x 1080		
Touch Screen Type	True flat resistive t	ouch / True flat projected	d capacitive touch		
Storage					
HDD	2.5	5" Slim HDD bay, SATA HE	D		
Flash Memory	SATA SSD Flash r	nemory card 8G/16G/3	2G/64G (option)		
Peripherals	Peripherals				
Web Cam (Build-in)		2M Web Cam			
MSR-right side(Optional)		3 Track(USB)			
WiFi (Optional)	802.11 b/g/n WLAN card				
Device Box(Optional)	Smart IC card Reader/Scanner/Function Key Pad/Line Out/Mic In				
Expansion					
Mini PCI-E Socket		2 (1 x MB, 1 x F40)			
External I/O Ports					
USB3.0		2 x USB type A			
USB2.0		4 x USB Type A			
Serial / COM	3 x RJ48 (0V/5V/12V default BIOS setting 0V), 1 x RS-232/422				
	without power				
Parallel	N/A				
LAN (10/100/1000)	2 x RJ-45				
VGA 1 x DB 15 female					
Audio Jack	1 x Mic-in, 1 x Line-out				
DC Jack	1 x Latch type (4pin)				
e-SATA	Blind Hole				
Power Button	1				
DVI-D		1			

Model Name	TP-3040		
Mainboard	3040		
Thermal Solution			
Thermal Solution	1 x	Fan	2 x Fan
Audio			
Speaker		2 x 2W	
Environment			
EMC & Safety	FCC/CE Class A/LVD/EN 60601-1-2		
Operating Temperature	0°C ~ 35°C (32°F ~ 95°F))
Storage Temperature	-20° ~ 60°C (-4°F ~ 140°F)		F)
Humidity	25% - 85% RH non-condensing		ng
Dust & Water Proof		IP 54 (front panel)	
Dimensions (W x D x H)	396 x 245 x 48 mm	464 x 284 x 48 mm	536 x 328 x 48 mm
Weight (N.W./G.W.)	4.5kg/5.5kg	6.8kg/7.8kg	8kg/9kg
Mounting	75mm x 75mm Standard VESA / Panel Mount		
OS Support	Windows 7, POSReady	7, Windows 8.1, Linux, W	indows 10 IOT (64-bit)

Model Name	TP-4040					
Mainboard	4040					
CPU	Intel® BayTrail J1900 2.0G (Turbo 2.41G), L2 2M, 10W					
Chipset	NA					
System Memory	DDR3L, SO-DIMM x1 , FSB 1066 / 1	1333Mhz, max. 8G				
Graphic Memory	Intel Gen7@>300N	IHz				
LAN controller (Giga LAN)	Realtek RTL8111E-VL-CG 10/100/	/1000 BaseT LAN				
Audio controller	Realtek ALC662VD0	-GR				
Super I/O controller	NCT6106D					
LVDS controller	Realtek RTD2136	R				
BIOS	Phoenix UEFI					
Touch controller	EETI USB interfac	e				
LCD/Touch Panel						
LCD Size	15.6" LED LCD 18.5" LED LCD	21.5" LED LCD				
Brightness	220 nits	250 nits				
Maximal Resolution	1366 x 768	1920 x 1080				
Touch Screen Type	True flat resistive touch / True flat proje	ected capacitive touch				
Storage		·				
HDD	2.5" Slim HDD bay. SAT	A HDD				
Flash Memory	SATA SSD Flash memory card 8G/16	G/32G/64G (option)				
Peripherals						
Web Cam (Build-in)	2M Web Cam					
F40	2nd LAN (RJ-45) & COM & Wide Range Power (12~48Vdc)					
MSR-right side(Optional)	3 Track(USB)					
WiFi (Optional)	802.11 b/g/n WLAN card					
Device Box(Optional)	Smart IC card Reader/Scanner/Function Key Pad/Line Out/Mic In					
Expansion						
Mini PCI-E Socket	1 (half-length)					
External I/O Ports						
USB3.0	1 x USB Type A					
USB2.0	4 x USB Type A					
Serial / COM	3 x RJ48 (0V/5V/12V default BIOS setting 0V), 1 x RS-232/422 without power					
LAN	1 x RJ-45					
2 nd LAN	mini-PCle to F40 (port o	on F40)				
VGA	1 x DB 15 female	<u>;</u>				
Audio Jack	1 x Mic-in, 1 x Line-	out				
DC Jack	1 x Latch type (4pi	n)				
Power Button	1					
DVI-D	1(option)					
Thermal Solution						
Thermal Solution	1 x Fan	2 x Fan				
Audio						
Speaker	2 x 2W					
Power						
Power Adapter	DC 19V / 65W	DC 19V / 90W				
Environment						
EMC & Safety	FCC/CE Class A/LVD/EN 60601-1-2					
Operating Temperature	0°C ~ 35°C (32°F ~ 95°F)					
Storage Temperature	-20° ~ 60°C (-4°F ~ 140°F)					

Model Name	TP-4040					
Mainboard	4040					
Humidity	25% - 85% RH non-condensing					
Dust & Water Proof	IP 54 (front panel)					
Dimensions (W x D x H)	396 x 245 x 48 mm	464 x 284 x 48 mm	536 x 328 x 48 mm			
Weight (N.W./G.W.)	4.5kg/5.5kg 6.8kg/7.8kg 8kg/9kg					
Mounting	75mm x 75mm Standard VESA / Panel Mount					
OS Support	Windows 7, POSReady 7, Windows 8.1, Linux, Windosw 10 IOT					

Model Name	TP-5040				
Mainboard	5040				
	Intel SKYLAKE U CPU				
CPU	Celeron 3955U 2GHz, LLC 2M (15W)				
	i3-6100U 2.3GHz, LLC 3M (15W)				
		i5-6300U 2.4GHz			
Chipset		SoC built-in CPU			
System Memory	DDR3L:	1600MHz (8GB Max); 1 C	hannel		
Graphic Memory	Intel Gra	phic (Gen 9) DX12, define	e on CPU		
LAN controller (Giga LAN)	Realtek RTL8	111E-VL-CG 10/100/100	0 baseT LAN		
LCD/Touch Panel	1				
LCD Size	15.6" LED LCD	18.5" LED LCD	21.5" LED LCD		
Brightness	220 nits	250	nits		
Maximal Resolution	1366	x 768	1920 x 1080		
Touch Screen Type	True flat resistive t	touch / True flat projected	I capacitive touch		
Storage	1				
HDD	2.5	5" Slim HDD bay, SATA HD	D		
Flash Memory	SATA SSD Flash r	memory card 8G/16G/32	2G/64G (option)		
Peripherals	1				
Web Cam (Build-in)		2M Web Cam	-		
F40	2nd LAN (RJ-45) & COM & Wide Range Power (12~48Vdc)				
MSR-right side(Optional)	3 Track(USB)				
WiFi (Optional)	802.11 b/g/n WLAN card				
Device Box(Optional)	Smart IC card Reader/Scanner/Function Key Pad/Line Out/Mic In				
Expansion	1				
Mini PCI-E Socket		1 (half-length)			
External I/O Ports	·				
USB3.0		4 x USB Type A			
USB2.0		2 x USB Type A			
Serial / COM	3 x RJ48 (0V/5V/12V default BIOS setting 0V), 1 x RS-232/422 without power				
I AN		1 x R I-45			
2 nd LAN	mir	ni-PCle to F40 (port on F4	.0)		
VGA		1 x DB 15 female	- /		
Audio Jack		1 x Mic-in. 1 x Line-out			
DC Jack		1 x Latch type (4pin)			
Power Button		1			
DVI-D		1(option)			
Thermal Solution	1	(-1)			
Thermal Solution	1 >	Fan	2 x Fan		
Audio			,		
Speaker	2 x 2W				
Power					
Power Adapter	DC 19V / 65W DC 19V / 90W				
Environment			, , , , , , , , , , , , , , , , , , ,		
EMC & Safety	FCC/CE Class A/LVD/EN 60601-1-2				
Operating Temperature	0°C ~ 35°C (32°F ~ 95°F)				
Storage Temperature	-20° ~ 60°C (-4°F ~ 140°F)				

Model Name	TP-5040					
Mainboard	5040					
Humidity	25%	- 85% RH non-condensi	ng			
Dust & Water Proof		IP 54 (front panel)				
Dimensions	206 v 245 v 49 mm	161 x 281 x 18 mm	526 x 220 x 40 mm			
(W x D x H)	590 X 245 X 40 mm	404 X 204 X 40 11111	550 x 526 x 46 11111			
Weight (N.W./G.W.)	4.5kg/5.5kg 6.8kg/7.8kg 8kg/9kg					
Mounting	75mm x 75mm Standard VESA / Panel Mount					
	Windows 7 pro(64-bit), POSReady 7 (64-bit), Windows 8.2					
05 Support	bit), Windows Embedded industry 8.1(64-bit), Windows 10 (64-bit),					
03 Support	Windows 10 IOT (64-bit)					
		Linux				

Model Name	TM-5040					
Mainboard	5040					
		Intel SKYLAKE U CPU				
	Celeron	Celeron 3955U 2GHz, LLC 2M (15W,EIA)				
CPU	(i3-610	0U 2.3GHz, LLC 3M (15)	N, EIA))			
	i5-630	00U 2.4GHz, LLC 3M (15	5W,IA)			
	(i7-660	00U 2.6GHz, LLC 4M (15	W, EIA)			
Chipset		NA				
System Memory	DDR4 21	.33 MHz (32GB Max) ; 2	Channel			
Graphic Memory	Intel Grap	ohic (Gen 9) DX12, define	e on CPU			
LAN controller (Giga LAN)	Intel WG I219 L	M (1st LAN), Intel WG I2	11 AT (2 nd LAN)			
LCD/Touch Panel						
LCD Size	15.6" LED LCD	18.5" LED LCD	21.5" LED LCD			
Brightness	220 nits	250	nits			
Maximal Resolution	1366	x 768	1920 x 1080			
Touch Screen Type	True flat resistive t	ouch / True flat projected	d capacitive touch			
Storage	-					
HDD	2.5	5" Slim HDD bay, SATA HE	DD			
Flash Memory	SATA SSD Flash memory card 8G/16G/32G/64G (option)					
Peripherals	·					
Web Cam (Build-in)	2M Web Cam					
MSR-right side(Optional)	3 Track(USB)					
WiFi (Optional)	802.11 b/g/n WLAN card					
Device Box(Optional)	Smart IC card Reader/Scanner/Line Out/Mic In/RFID					
Expansion						
Mini PCI-E Socket	1 (half-length)					
External I/O Ports						
USB	2 x USB2.0					
		4 x USB 3.0/2.0				
Serial / COM	2 x RJ48 (0V/5V/12	V default BIOS setting 0	/), RS232/422/485			
LAN		1 (1x WG1219LM)				
2 nd LAN		1(1x INTEL WG1211AT)				
HDMI		1				
VGA		1 x DB 15 female				
Audio Jack		1 x Mic-in, 1 x Line-out				
DC Jack	1 (Lock type)					
Power Button	1					
Control / Indicater						
Power switch	1					
Audio						
Speaker	2 x 2W					
Power						
Wide Range Voltage	12V ~ 48V					

Model Name		TM-5040				
Mainboard	5040					
	DC 19V/90W					
Dowor Adaptor	Mfr.: MEAN WELL Enterprises Co., Ltd.					
Power Adapter	Model: GSM90A19					
	I/P: 100-240Vac, 50/60 Hz, 1.3-0.6A					
Environment						
EMC & Safety		FCC / CE Class B, LVD				
	FCC / CE(EN	155032:2010 + AC:2016	CLASS B)			
		EN60601-1-2:2015				
	Stand	lard: ANSI/AAMI ES6060	1-1			
	(2005/®202	L2 + A1:2012, C1:2009/	(R)2012+			
Certification	A2:2010/(R)2012) -	Amendment 1 - Revision	Date 2012/08/21			
	CAN/CSA-C22.2 No. 60601-1:14 - Edition 3 - Revision Date 2014/03					
	RoHS(2011/65/EU)					
	WEEE(2012/19/EU)					
	REACH					
Operating Temperature	0°(C ~ 40 °C (32 °F ~ 104 °F	-)			
Storage Temperature	-20	0° ~ 60°C (-4°F ~ 140°F)			
Operating Altitude Range		0-2000m				
Storage Altitude Range		0-2000m				
Humidity	20%	- 85% RH non-condensi	ng			
Dust & Water Proof	IPXC) (IP54 for front panel on	ly)			
Dimensions(W x D x H)	396 x 245 x 48 mm 464 x 284 x 48 mm 536 x 328 x 48 mm					
Weight	3.76kg	5.02kg	6.9kg			
Mounting	75mm x 75	mm Standard VESA / Pa	nel Mount			
	Legacy: Windows 7					
OS Support	UEFI: Windows Embedded industry 8.1 (64-bit), Windows IOT 10(6					
	Linux : Ubuntu After 15.10, Fedora After 23					

5. Configuration

5-1. 3040 Motherboard Layout



5-1-2. Connectors & Functions

Connector	Function			
CN1	SATA power connector			
CN3	Inverter connector			
CN4	LVDS connector			
CN5	CPU FAN connector			
CN6	System FAN connector			
CN7	HDD LED connector			
CN8	peaker & MIC connector			
CN9/10	USB port (internal)			
CN11	Power LED connector			
CN12	40pin external connector			
CN13	EC Debug			
CN14	Printer connector			
CN15	MSR connector			
CN16	COM5 (touch) connector			
CN17	PS2 keyboard connector			
CN18	RTC connector			
CN19	Wide Range			
CN20	Power button (internal)			
CN21	_CM connector			
CN22	51pin connector			
CN23	SDU connector			
CN24	SDU connector (LAN)			
RJ45_1	LAN connector			
RJ45_2	COM1/ COM2			
RJ48_1	СОМЗ			
PWR1	DC Jack (4 pin)			
PWR2	DC Jack (2 pin)			
SATAO	SATAO			
SATA1	SATA1			
SW1	Power button			
USB1	USB3.0			
USB4	USB2.0			
USB6	USB2.0			
VGA1	CRT connector			
DDR3_A	DDR3 SO-DIMM			
JP1	Inverter select			
JP2	Hareware Reset			
JP3	Touch connector			
JP4	LCD ID setting			

5-1-3. Jumper Setting

Inverter Selection

Function	JP1
▲ LED	1 3 2 4
CCFL	$ \begin{array}{c} 1 \\ 3 \\ 2 \\ 4 \end{array} $

COM1/COM2/COM3 Power Setting

COM1, COM2 and COM3 can be set to provide power to your serial device. The voltage can be set to +5V or +12V in the BIOS.

- Power on the system, and press the key when the system is booting up to enter the BIOS Setup utility.
- 2. Select the Advanced tab.
- Select VGA/COM Power Configuration Ports and press <Enter> to go to display the available options.
- 4. To enable the power, select COM1 ,COM2 or COM3 Power setting and press <Enter>. Select Power and press <Enter>. Save the change by pressing F10.





▲ = Manufacturer Default Setting

LCD ID Setting

Deve el #	Desclution	L	/DS	Output	
Panel#	Resolution	Bits	Channel	Interface	JP4
1	800 x 600	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
2	800 x 600	24	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
3	1024 x 768	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
4	1024 x 768	24	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
5	1366 x 768	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
6	1366 x 768	24	Single	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
7	1024 x 600	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
8	1280 x 1024	24	Dual	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
9	1440 x 900	24	Dual	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
15	1920 x 1080	24	Dual	LVDS Panel	1 3 5 7 9 2 4 6 8 10
				CRT	$\begin{array}{rrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrr$
1					

122Jumper open2Jumper short

5-2. 4040 V2.1 Motherboard Layout

5-2-1. Motherboard Layout



Connector	Function			
CN1	Front I/O board			
CN2	Inverter connector			
CN3	LVDS connector			
CN6	System FAN connector			
CN7	LPT port connector			
CN8	Speaker & MIC connector			
CN9	40pin external connector			
CN10	HDD LED connector			
CN11	Power LED connector			
CN12	SATA power connector			
CN13/14	USB port (internal)			
CN15	PS2 keyboard connector			
CN17	MSR connector			
CN18	COM5 (touch) connector			
CN19	Wide Range			
CN20	Power button (internal)			
CN21	LCM connector			
CN22	POS325 51pin connector			
CN25	S5/S0 Status LED			
PWR1/PWR2	DC Jack			
RJ45_1	LAN connector			
RJ45_2	COM1/ COM2			
RJ48_1	COM3			
DDR3_A1	DDR3 SO-DIMM			
SATAO/SATA2	SATA			
USB1/USB2	USB2.0			
USB3	USB3.0			
VGA1	CRT connector			
SW1	Power button			
MINI_PCIE1	MINI PCIE			
JP1	Inverter select			
JP4	LCD ID setting			
JP7	Touch connector			

5-2-2. Connectors & Functions

5-2-3. Jumper Setting

Inverter Selection

Function	JP1
▲ LED	1 3 2 4
CCFL	$\begin{array}{c}1&3\\2&4\end{array}$

COM1/COM2/COM3 Power Setting

COM1, COM2 and COM3 can be set to provide power to your serial device. The voltage can be set to +5V or +12V in the BIOS.

- Power on the system, and press the key when the system is booting up to enter the BIOS Setup utility.
- 2. Select the Advanced tab.
- Select VGA/COM Power Configuration Ports and press <Enter> to go to display the available options.
- To enable the power, select COM1 ,COM2 or COM3 Power setting and press <Enter>. Select Power and press <Enter>. Save the change by pressing F10.





▲ = Manufacturer Default Setting

LCD ID Setting

Den el#	Decelution	L	/DS	Output	
Panel#	Resolution	Bits	Channel	Interface	JP3
1	800 x 600	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
2	800 x 600	24	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
3	1024 x 768	18	Single	LVDS Panel	$\begin{array}{cccccccccccccccccccccccccccccccccccc$
4	1024 x 768	24	Single	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
5	1366 x 768	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
6	1366 x 768	24	Single	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
7	1024 x 600	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
8	1280 x 1024	24	Dual	LVDS Panel	1 3 5 7 9 2 4 6 8 10
9	1440 x 900	24	Dual	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
10	1028 x 800	18	Dual	LVDS Panel	$ \begin{bmatrix} 1 & 3 & 5 & 7 & 9 \\ 2 & 4 & 6 & 8 & 10 \end{bmatrix} $
15	1920 x 1080	24	Dual	LVDS Panel	1 3 5 7 9 2 4 6 8 10
				CRT	1 3 5 7 9 2 4 6 8 10

1
2Jumper open1
2Jumper short

5-3. 4040 V4.0 Motherboard Layout

SW1



5-3-1. Motherboard Layout

Connector	Function		
CN1/CN13/CN21/CN29	Internal USB connector		
CN5	EC Debug		
CN6	CPU FAN connector		
CN7	LPT connector		
CN9	40Pin connector		
CN12	SATA power connector		
CN18	COM5 (touch) connector		
CN19	Wide range power connector		
CN25	S0/S5 LED & Power button connector		
CN26	51P connector		
CN27	eDP connector		
CN31	Speaker L output		
CN32	Speaker R output		
CN33	MIC output		
CN34	Earphone connector		
BAT1	Battery connector		
PWR1/PWR2	DC Jack		
RJ11_1	Cash drawer connector		
RJ45_1	LAN connector		
RJ45_2	COM1/ COM2		
RJ48_1	СОМЗ		
DDR3_A1	DDR3 SO-DIMM		
SATA1/SATA2	SATA connector		
USB1/USB2	USB2.0		
USB3	USB3.0		
VGA1	CRT connector		
SW1	Power button		
MINI_PCIE1	MINI PCIE		
JP6	Cash drawer power setting		

5-3-2. Connectors & Functions

5-3-3. Jumper Setting

Cash	Drawer	Power	Setting
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Function	JP6
▲+19V	1 3 2 4
+12V	1 3 2 4

COM1/COM2/COM3 Power Setting

COM1, COM2 and COM3 can be set to provide power to your serial device. The voltage can be set to +5V or +12V in the BIOS.

- Power on the system, and press the key when the system is booting up to enter the BIOS Setup utility.
- 2. Select the Advanced tab.
- Select VGA/COM Power Configuration Ports and press <Enter> to go to display the available options.
- To enable the power, select COM1 ,COM2 or COM3 Power setting and press <Enter>. Select Power and press <Enter>. Save the change by pressing F10.





▲ = Manufacturer Default Setting

5-4. 5040 Motherboard



5-4-1. Motherboard Layout

5-4-2. Connectors & Functions

Connector	Function		
CN1	Front I/O board		
CN2	Inverter connector		
CN3	LVDS connector		
CN4	NFC		
CN5	HDD LED connector		
CN6	USB connector		
CN7	System FAN connector		
CN8	LPT port connector		
CN9	Smart device connector		
CN10	Debug port		
CN11	Speaker & MIC connector		
CN12	40 pin external connector		
CN13	Audio connector(right)		
CN14	Audio connector(left)		
CN15	two color LED		
CN16	SATA power connector		
CN17/18	USB connector		
CN19	SDR connector		
CN20	Battery connector		
CN21	Power LED connector		
CN22	PS/2 connector		
CN23	COM5 connector		
CN24	Wide range connector		
CN25	Power button connector		
CN26	LCM connector		
CN27	51 pin connector		
PWR1/PWR2	DC Jack		
RJ11_1	Cash drawer connector		
RJ45_1	LAN connector		
RJ45_2	COM1/ COM2		
RJ48_1	СОМЗ		
DDR3_A1	DDR3 SO-DIMM		
SATAO/SATA1	SATA connector		
USB1/USB2	USB3.0		
USB3	USB2.0		
VGA1	CRT connector		
SW1	Power button		
MINI_PCIE1	MINI PCIE		
JP1	Hardware reset		
JP2	RTC reset		
JP3	LCD ID setting		
JP4	Cash drawer power setting		

5-4-3. Jumper Setting

Cash Drawer Power Setting

Function	JP4
▲ +19V	1 3 2 4
+12V	1 3 2 4

COM1/COM2/COM3 Power Setting

COM1, COM2 and COM3 can be set to provide power to your serial device. The voltage can be set to +5V or +12V in the BIOS.

- Power on the system, and press the key when the system is booting up to enter the BIOS Setup utility.
- 2. Select the Advanced tab.
- Select VGA/COM Power Configuration Ports and press <Enter> to go to display the available options.



4. To enable the power, select COM1 ,COM2 or COM3 Power setting and press <Enter>. Select Power and press <Enter>. Save the change by pressing F10.



= Manufacturer Default Setting

LCD ID Setting

Donol#	Pocolution	L	/DS	Output	כסו
Fallel#	Resolution	Bits	Channel	Interface	JFS
1	800 x 600	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
2	800 x 600	24	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
3	1024 x 768	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
4	1024 x 768	24	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
5	1366 x 768	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
6	1366 x 768	24	Single	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
7	1024 x 600	18	Single	LVDS Panel	1 3 5 7 9 2 4 6 8 10
8	1280 x 1024	24	Dual	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
9	1440 x 900	24	Dual	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
15	1920 x 1080	24	Dual	LVDS Panel	1 3 5 7 9 2 4 6 8 10
				CRT	1 3 5 7 9 2 4 6 8 10

112Jumper open12Jumper short

5-5. 5040 Motherboard

5-5-1. Motherboard Layout



Connector	Function		
CN1/2	SATA power connector		
CN3	EC debug port		
CN4	Printer connector		
CN5	M.2 WiFi socket		
CN6	SDV connector		
CN8/9/10	USB2.0 connector		
CN11	COM4 connector		
CN12	Inverter connector		
CN13	eDP connector		
CN14	Bedside connector		
CN15	DP/HDMI Connector		
CN16	DICOM Connector		
CN17	DICOM for LVDS VDD EN		
CN18	LVDS connector		
CN19	SDR connector		
CN20	ON/OFF & Power LED connector		
CN21	Build in Speaker/MIC connector		
CN22	Build in speaker(left)		
CN23	Build in speaker(right)		
CN24	Audio jack		
CN25	Charger board power connector		
CN26	Charger board function connector		
CN27/28	LAN2 LED connector for by pass no isolator		
PCIE1	PCIE X4 slot connector		
FAN1	FAN connector		
НДМІ	HDMI connector		
AUX1	MIC in jack		
PWR1/PWR2	DC Jack		
RJ11_1	Cash drawer connector		
RJ45_1	LAN1 connector		
RJ45_2	COM1/COM2_RS232/422/485		
RJ45_3	LAN2 connector		
DiMM_A1 / DIMM_B1	DDR4 SO-DIMM		
SATAO/SATA1	SATA connector		
BAT1	Battery socket		
USB1/USB2	USB3.0		
USB3	Isolator USB connector		
COM1	CRT connector		
SW1	Power button		
MINI_PCIE1	Mini PCIe WiFi socket		
JP1	LCD ID setting		
JP2	Clear CMOS		
JP3	Hareware reset		
JP4/5	isolator USB speed select		
JP6	Audio Mono setting		

5-5-2. Connectors & Functions

5-5-3. Jumper Setting

Function	JP4	JP5			
USB1.0	1 3 2 4	1 3 2 4			
▲ USB1.1	1 3 2 4	1 3 2 4			

Isolator USB(up port) speed select

Isolator USB(down port) speed select

Function	JP4	JP5
USB1.0	1 3 2 4	$\begin{array}{c}1\\3\\2\end{array}$
▲ USB1.1	1 3 2 4	1 3 2 4

Audio Mono select

Function	JP6
Mono	1 2
▲ Standard	<u>1</u> 2

LCD ID Setting

Donol#	Papal# Pacalution		LVDS		ID1
Fallel#	Resolution	Bits	Channel	Interface	JPI
14	1920 x 1080	24	Dual	LVDS Panel	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$
15	1920 x 1080	24	Dual	LVDS Panel	1 3 5 7 9 2 4 6 8 10

1 2 Jumper open 2 Ju

1 2 Jumper short

▲ = Manufacturer Default Setting

COM1/COM2 Power Setting

COM1, COM2 can be set to provide power to your serial device. The voltage can be set to +5V or +12V in the BIOS.

Phoenix SecureCore Technology Setup Advanced				
	VGA/COM Power Configuration	Item Specific Help		
COM1 Power COM2 Power COM1 RS232 Mode COM1 RTS pin invert COM2 RS232 Mode COM2 RTS pin invert LCD Brightness Control AUDIO Volume Control	VGA/COM Power Configuration	Item Specific Help		
	F1 Help 14 SelectItem +/- ChangeValues F9 Se Fsc Fxit +→ SelectNenu Enter SelectトSub-Nenu F10 Sa	tup Defaults up and Fxit		

- 1. Power on the system, and press the key when the system is booting up to enter the BIOS Setup utility.
- 2. Select the Advanced tab.
- Select VGA/COM Power Configuration Ports and press <Enter> to go to display the available options.
- 4. To enable the power, select COM1 ,COM2 Power setting and press <Enter>. Select Power and press <Enter>. Save the change by pressing F10.