



List of Approved Power-Assisted Bicycle (PAB) Models (as at 1 January 2024)

1. LTA does not endorse either the PAB models or their retailers in this list. Consumers should make their own assessment based on their needs before purchasing the PABs from the retailers.
2. To meet LTA's technical requirements, retailers have worked with PAB manufacturers to produce the PABs without a start-up assistance feature.
3. The approval granted for PAB models is both retailer and model specific, and non-transferable. New applicants who wish to import identical PAB models in the list will be required to undergo fresh approval and sealing.
4. Consumers should only purchase PABs that are affixed with an orange seal bearing LTA's logo and a serialised number, as these PABs have been assessed to comply with LTA's technical requirements at the point of sealing.
5. Do not add/modify the PAB's battery and only use original batteries of approved specifications (listed below) recommended by the PAB manufacturer.
6. Consumers should only purchase and use original power adapters or chargers (supplied by the PAB manufacturer) that display an [ESG SAFETY Mark with a valid serial number](#).
7. For more information on PAB requirements, click [here](#).




EN 15194:2017 Compliant PAB Models	
Make & Model: ALPS ETFT-S7DR	
PAB Manufacturer: Huanrui(Tianjin) Electric Vehicle Technology Co.,Ltd	
Battery Model: 366.8WY	
Battery Manufacturer: Guangdong Greenway Technology Co.,Ltd	
Battery Voltage & Capacity: 36V 6.8Ah	
Make & Model: AXIDE EC297	
PAB Manufacturer: Willing Ind.Co Ltd	
Battery Model: BT-E8035L	
Battery Manufacturer: Shimano	
Battery Voltage & Capacity: 36V 14Ah	

Make & Model: BROMPTON ELECTRIC MK.1	
PAB Manufacturer: Brompton Bicycle Ltd	
Battery Model: 10INR19/65-3	
Battery Manufacturer: BMZ Batterien-Montage-Zentrum GmbH Group	
Battery Voltage & Capacity: 36.5V 8.55Ah	
Make & Model: DRIVE Ranger	
PAB Manufacturer: Shenzhen Rongxinfu Lithium Electricity technology Co.,Ltd	
Battery Model: HCI-SILVER FISHD24818	
Battery Manufacturer: Jin Hua Heng Chuang New Energy Co;Ltd	
Battery Voltage & Capacity: 48V / 18Ah	
Make & Model: DRIVE Sport	
PAB Manufacturer: Shenzhen Rongxinfu Lithium Electricity technology Co.,Ltd	
Battery Model: 48V15AH	
Battery Manufacturer: Dongguan Liushi Lithium Technology Co.,Ltd	
Battery Voltage & Capacity: 46.8V / 15Ah	

Make & Model: EXPRESS DRIVE	
PAB Manufacturer: Shenzhen Rongxinfa Lithium Electricity Technology Co., Ltd.	
Battery Model: HCI-SILVER FISHD24810.5	
Battery Manufacturer: Wanda Battery Intelligent Technology Co., Ltd.	
Battery Voltage & Capacity: 48V 10.5Ah	
Make & Model: Honbike U4	
PAB Manufacturer: Honebike B.V.	
Battery Model: WD-CD3612-A	
Battery Manufacturer: Hunan Wisdom Technology Co.,Ltd	
Battery Voltage & Capacity: 36V / 12Ah	
Make & Model: JI-MOVE MC	
PAB Manufacturer: Foshan Jidong Vehicle Industry Co., Ltd	
Battery Model: HCI-SILVER FISHD23621	
Battery Manufacturer: Jin Hua Heng Chuang New Energy Co., Ltd.	
Battery Voltage & Capacity: 36V 21Ah	

Make & Model: JI-MOVE MC-PRO	
PAB Manufacturer: Foshan Jidong Vehicle Industry Co.Ltd	
Battery Model: HCI-001 D24819.2	
Battery Manufacturer: Jin Hua Heng Chuang New Energy Co.Ltd	
Battery Voltage & Capacity: 48V 19.2Ah	
Make & Model: MAXIMALSG PAB-16-02	
PAB Manufacturer: Maximal Pte Ltd.	
Battery Model: LB-LG48V10AH / LB-LG4815-01	
Battery Manufacturer: Maximal Pte Ltd	
Battery Voltage & Capacity: 48V (14.4Ah / 9.6Ah)	
Make & Model: MAXIMALSG PAB-20-05	
PAB Manufacturer: Maximal Pte Ltd.	
Battery Model: LB-LG48V10AH / LB-LG4815-01	
Battery Manufacturer: Maximal Pte Ltd	
Battery Voltage & Capacity: 48V (14.4Ah / 9.6Ah)	

Make & Model: MAXIMALSG PAB-20-03 (Front Disk brake / Rear Disk Brake)	
PAB Manufacturer: Maximal Pte Ltd.	
Battery Model: LB-LG4815-01	
Battery Manufacturer: Maximal Pte Ltd	
Battery Voltage & Capacity: 48V 14.4Ah	
Make & Model: MAXIMALSG PAB-20-03 (Front Disk brake / Rear V Brake)	
PAB Manufacturer: Maximal Pte Ltd.	
Battery Model: LB-LG4815-01	
Battery Manufacturer: Maximal Pte Ltd	
Battery Voltage & Capacity: 48V 14.4Ah	
Make & Model: MAXIMAL SG PAB-20-04	
PAB Manufacturer: Maximal Pte Ltd.	
Battery Model: LB-EV4813-01	
Battery Manufacturer: Maximal Pte Ltd	
Battery Voltage & Capacity: 46.8V 12.8Ah	

Make & Model: MIDO PRO	
PAB Manufacturer: YY Scooter Pte Ltd	
Battery Model: WDD36105X242	
Battery Manufacturer: Wanda Battery Intelligent Technology Co., Ltd.	
Battery Voltage & Capacity: 36V 10.5Ah	
Make & Model: MOBOT City LS	
PAB Manufacturer: Dongguan Lehe Intelligent Technology Co.,Ltd	
Battery Model: NZ0131004	
Battery Manufacturer: Guangdong Greenway technology Co.,Ltd	
Battery Voltage & Capacity: 36V / 10.4Ah & 36V /11.6Ah	
Make & Model: MOBOT LEADER 2.0	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicles Co., Ltd.	
Battery Model: 48V15AH	
Battery Manufacturer: Dongguan Liushi Lithium Technology Co., Ltd.	
Battery Voltage & Capacity: 46.8V 15Ah	

Make & Model: MOBOT LEADER	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicles Co., Ltd.	
Battery Model: 48V14AH	
Battery Manufacturer: Dongguan Liushi Lithium Technology Co., Ltd.	
Battery Voltage & Capacity: 46.8V 14Ah	
Make & Model: MOBOT S3	
PAB Manufacturer: Dongguan Lehe Intelligent Technology Co. Ltd	
Battery Model: NZ0131004	
Battery Manufacturer: Guangdong Greenway Technology Co. Ltd	
Battery Voltage & Capacity: 36V (10.4Ah / 11.6Ah)	
Make & Model: MOBOT ORCA 3.0	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicles Co., Ltd.	
Battery Model: 48V20Ah	
Battery Manufacturer: Dongguan Liushi Lithium Technology Co., Ltd.	
Battery Voltage & Capacity: 46.8V 20Ah	



Make & Model: MOBOT ORCA	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicles Co., Ltd.	
Battery Model: 48V17.5AH	
Battery Manufacturer: Dongguan Liushi Lithium Technology Co., Ltd.	
Battery Voltage & Capacity: 46.8V 17.5Ah	
Make & Model: MOBOT ULTRA	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicles Co., Ltd.	
Battery Model: 48V25AH	
Battery Manufacturer: Dongguan Liushi Lithium Technology Co., Ltd.	
Battery Voltage & Capacity: 46.8V 25Ah	
Make & Model: MOBOT ULTRA RT	
PAB Manufacturer: Dongguan Lehe Intelligent Technology Co.,Ltd	
Battery Model: LH0258	
Battery Manufacturer: Shenzhen Yima power Supply Co.,Ltd	
Battery Voltage & Capacity: 48V / 25AH	

Make & Model: NAKXUS NF1	
PAB Manufacturer: Guangzhou Symbol Bicycle Co. Ltd.	
Battery Model: HA184	
Battery Manufacturer: Shen Zhen HANI Energy Technology Co., Ltd.	
Battery Voltage & Capacity: 36V 8.7Ah	
Make & Model: PEDELEC ROGI KING+	
PAB Manufacturer: EMK Vehicle (Kunshan) Co. Ltd	
Battery Model: RP-HB4824	
Battery Manufacturer: Ren Pu (suzhou)NewEnergy Technology Co.,Ltd	
Battery Voltage & Capacity: 48V 24Ah	
Make & Model: PEDELEC ROGI MAX+	
PAB Manufacturer: EMK Vehicle (Kunshan) Co. Ltd	
Battery Model: WDD36210H002	
Battery Manufacturer: Wanda Battery Intelligent Technology (Kunshan) Co. Ltd	
Battery Voltage & Capacity: 36V 21Ah	

Make & Model: PEDELEC ROGI S+	
PAB Manufacturer: EMK Vehicle (Kunshan) Co. Ltd	
Battery Model: RP-HB4830	
Battery Manufacturer: Ren Pu (suzhou)NewEnergy Technology Co. Ltd	
Battery Voltage & Capacity: 48V 28.8Ah	
Make & Model: SNAPCYCLE ROADMASTER	
PAB Manufacturer: Wuhan Leiyi Technology Co.,Ltd	
Battery Model: YT30207	
Battery Manufacturer: Spard New Energy Co.,Ltd	
Battery Voltage & Capacity: 36V / 14Ah	
Make & Model: SNAPCYCLE ROADTRAVELLER	
PAB Manufacturer: Wuhan Leiyi Technology Co.,Ltd	
Battery Model: HCUT-EEL-MINID23612	
Battery Manufacturer: Jin Hua heng Chuang New Energy Co.,Ltd	
Battery Voltage & Capacity: 36V / 12Ah	

Make & Model: ULLMAX-X16	
PAB Manufacturer: Kushan Huan Yu Intelligent Technology Co.,Ltd	
Battery Model: RP-HLMAX4820	
Battery Manufacturer: Ren Pu(suzhou)New Energy Technology Co.,Ltd	
Battery Voltage & Capacity: 48V / 19.2Ah	
Make & Model: VENOM 2+ 001Z	
PAB Manufacturer: Zhongxin Power (Tianjin) Bicycle Co. Ltd.	
Battery Model: O LONG 2Z	
Battery Manufacturer: Changxing Tianhong Lithium-ion Battery Technology Co Ltd.	
Battery Voltage & Capacity: 36V 10Ah	
Make & Model: VENOM 2 002Z	
PAB Manufacturer: Zhongxin Power (Tianjin) Bicycle Co. Ltd.	
Battery Model: O LONG 2Z	
Battery Manufacturer: Changxing Tianhong Lithium-ion Battery Technology Co Ltd.	
Battery Voltage & Capacity: 36V 6Ah/10Ah	

Make & Model: Zebra M037	
PAB Manufacturer: Heshan Galaxy Bicycle Co.,Ltd	
Battery Model: TD-1RM YT30208-ML	
Battery Manufacturer: YunTong Power Co.,Ltd	
Battery Voltage & Capacity: 36V/ 10.4Ah	

EN 15194:2009+A1:2011 Compliant PAB Models	
Make & Model: A2B KUO+	
PAB Manufacturer: Komda Industrial (S.Z.) Co., Ltd.	
Battery Model: G36928-BS22V3	
Battery Manufacturer: Dongguan Greenway Battery Co. Ltd.	
Battery Voltage & Capacity: 36V 9.0Ah	
Make & Model: APOLLO MARS	
PAB Manufacturer: Zhejiang Apollo Motorcycle Manufacturer Co. Ltd.	
Battery Model: Mars	
Battery Manufacturer: LN Energy	
Battery Voltage & Capacity: 36V 7.8Ah	

Make & Model: APOLLO SMART 1S	
PAB Manufacturer: Zhejiang Apollo Motorcycle Manufacturer Co. Ltd.	
Battery Model: Smart	
Battery Manufacturer: LN Energy	
Battery Voltage & Capacity: 36V 7.8Ah	
Make & Model: APOLLO SMART 1S+	
PAB Manufacturer: Zhejiang Apollo Motorcycle Manufacturer Co. Ltd.	
Battery Model: Smart	
Battery Manufacturer: LN Energy	
Battery Voltage & Capacity: 36V 7.8Ah	
Make & Model: BESV PS1	
PAB Manufacturer: Darfon Electronics Corporation	
Battery Model: -	
Battery Manufacturer: -	
Battery Voltage & Capacity: -	

Make & Model: DEUSVOLTS DV-X	
PAB Manufacturer: Kunshan Landon Trade Co., Ltd.	
Battery Model: T11CFH1WKL8A	
Battery Manufacturer: Winkind Tech CO.,LTD.	
Battery Voltage & Capacity: 36V 7Ah	
Make & Model: EXPRESS Y1+	
PAB Manufacturer: Shenzhen Chirrey Technology Co., Ltd	
Battery Model: Y1+ 10S4P	
Battery Manufacturer: Shenzhen Sinepow Electronics Co., Ltd.	
Battery Voltage & Capacity: 36V 14Ah	
Make & Model: FREY R01	
PAB Manufacturer: Frey Vehicle Ltd.	
Battery Model: FREY 300	
Battery Manufacturer: Hangzhou Lin'an Beyonder Power Co. Ltd.	
Battery Voltage & Capacity: 36V 6Ah	

Make & Model: JI-MOVE LC	
PAB Manufacturer: Foshan JI-MOVE Information Technology Co. Ltd.	
Battery Model: XNDL-JD04	
Battery Manufacturer: Huizhou wellgo Technology Co., Ltd	
Battery Voltage & Capacity: 36V 9.9Ah	
Make & Model: JI-MOVE MC	
PAB Manufacturer: Foshan JI-MOVE Information Technology Co. Ltd.	
Battery Model: XNDL-JD03	
Battery Manufacturer: Shenzhen Xinneng Dynamic Power Co Ltd.	
Battery Voltage & Capacity: 36V 20.8Ah	
Make & Model: KERNAL AM-GT	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicle Co., Ltd.	
Battery Model: 13S5P	
Battery Manufacturer: Shenzhen Xi Pinzhi technology co. LTD	
Battery Voltage & Capacity: 48V 17.5Ah	

Make & Model: KERNEL ORCA	
PAB Manufacturer: Shenzhen Yijiao Electric Vehicles Co., Ltd.	
Battery Model: 13S4P	
Battery Manufacturer: Shenzhen Matrix Power Supply Technology Co., Ltd	
Battery Voltage & Capacity: 48V 14Ah	
Make & Model: MAXIMAL PAB-20-02	
PAB Manufacturer: Maximal Pte. Ltd.	
Battery Model: SINC-36V10AH	
Battery Manufacturer: Qinhuangdao Xinchu Photoelectricity Technology Co., LTD	
Battery Voltage & Capacity: 36V 10Ah	
Make & Model: MAXIMAL PAB-16-01	
PAB Manufacturer: Maximal Pte. Ltd.	
Battery Model: 36V10.4AH	
Battery Manufacturer: Yong Kang Hong Huang Gong Mao CO, LTD	
Battery Voltage & Capacity: 36V 10.4Ah	

Make & Model: MINIMOTORS SCORPION	
PAB Manufacturer: Shenzhen Concepts Wit Technology Co. Ltd.	
Battery Model: GNS6	
Battery Manufacturer: Shenzhen World Electronic Co., Ltd	
Battery Voltage & Capacity: 36V 5.2Ah	
Make & Model: MOBOT MINI 12"	
PAB Manufacturer: Tianjin Anbike Electric Bicycle Co. Ltd.	
Battery Model: VICTPOWER VICTA10S2P	
Battery Manufacturer: Shezhen Victpower Technology Co. Ltd.	
Battery Voltage & Capacity: 36V 7.6Ah	
Make & Model: MOBOT MINI 16"	
PAB Manufacturer: Tianjin Anbike Electric Bicycle Co. Ltd.	
Battery Model: VICTPOWER VICTA10S2P	
Battery Manufacturer: Shezhen Victpower Technology Co. Ltd.	
Battery Voltage & Capacity: 36V 7.6Ah	

Make & Model: MOBOT S1-1	
PAB Manufacturer: Dongguan Lehe Intelligent Technology Co., Ltd.	
Battery Model: 1. 36V 7.8AH 2. 36V 5.2AH	
Battery Manufacturer: Shenzhen Yima Power Supply Co., Ltd	
Battery Voltage & Capacity: 1. 36V 7.8Ah 2. 36V 5.2Ah	
Make & Model: OULLON E16-1	
PAB Manufacturer: Taicang Tianhu Industrial Co., Ltd	
Battery Model: RPALE-1	
Battery Manufacturer: Coppercell Technology Co., Ltd.	
Battery Voltage & Capacity: 36V 7Ah	
Make & Model: PAB-20-01	
PAB Manufacturer: Maximal Pte. Ltd.	
Battery Model: SINC-36V10AH	
Battery Manufacturer: Qinhuangdao Xinch Photoelectricity Technology Co., LTD	
Battery Voltage & Capacity: 36V 10Ah	

Make & Model: PEDELEC MIDO	
PAB Manufacturer: Guangzhou Symbol Bicycle Co. Ltd.	
Battery Model: HA184	
Battery Manufacturer: Shen Zhen HANI Energy Technology Co., Ltd.	
Battery Voltage & Capacity: 36V 8.7Ah	
Make & Model: PEDELEC ROGI	
PAB Manufacturer: Changzhou Daimyo Vehicle Co., LTD	
Battery Model: YIMA 36V7.5AH	
Battery Manufacturer: Changzhou Daimyo Vehicle Co., LTD	
Battery Voltage & Capacity: 36V 7.5Ah	
Make & Model: PEDELEC ROGI MAX	
PAB Manufacturer: YY Scooter Pte Ltd	
Battery Model: 48V14ah	
Battery Manufacturer: Zhejiang Tianhong Lithium-Ion Battery Co., Ltd.	
Battery Voltage & Capacity: 48V 14Ah	

Make & Model: PEDELEC ROGI PRO	
PAB Manufacturer: YY Scooter Pte Ltd	
Battery Model: Li-Ion Battery, 48V14Ah	
Battery Manufacturer: ZheJiang Tianhong Lithium-Ion Battery CO.,LTD.	
Battery Voltage & Capacity: 48V 14Ah	
Make & Model: QUALISPORTS QSEB01-SG	
PAB Manufacturer: Changzhou Qualisports Technology Co., Ltd	
Battery Model: 10S2P/26PM	
Battery Manufacturer: Jiangsu Fuan Technology Co., Ltd	
Battery Voltage & Capacity: 36V 5.2Ah	
Make & Model: TORNADO AQUA	
PAB Manufacturer: Komda Industrial (Dongguan) Co. Ltd.	
Battery Model: LITHIUM-ION RECHARGEABLE BATTERY 36910	
Battery Manufacturer: Greenway Battery Co. Ltd.	
Battery Voltage & Capacity: 36V 9Ah	

Make & Model: TSINOVA TS01	
PAB Manufacturer: Beijing Tsinova Technology Co. Ltd.	
Battery Model: TS-01 BATTERY	
Battery Manufacturer: Beijing Tsinova Technology Co. Ltd. & Panasonic	
Battery Voltage & Capacity: 36V 5.8Ah	
Make & Model: ULLMAX-MTB24	
PAB Manufacturer: EMK Vehicle (Kunshan) Co., Ltd	
Battery Model: 48V 7.5AH	
Battery Manufacturer: Yong Kang Hong Huang Gong Mao CO, LTD	
Battery Voltage & Capacity: 48V 7.5Ah	
Make & Model: VEEBIKE F7	
PAB Manufacturer: Hangzhou Top Mechanical and Electrical Technology Co., Ltd.	
Battery Model: SCIMTAR	
Battery Manufacturer: Zhejiang Changxing DWP Energy Technology Co., Ltd.	
Battery Voltage & Capacity: 36V 7.5Ah	

Make & Model: XILIDA TDN20QQ	
PAB Manufacturer: Shenzhen Rongxinfu Lithium Electricity Technology Co. Ltd.	
Battery Model: HC10S4P	
Battery Manufacturer: Shenzhen Heng Deli New Energy Co. Ltd.	
Battery Voltage & Capacity: 36V 8Ah	
Make & Model: YUNMAKE TDM01Z	
PAB Manufacturer: Hangzhou Yunmake Technology Co. Ltd.	
Battery Model: C1 C-SERIES	
Battery Manufacturer: Hangzhou Yunmake Technology Co. Ltd.	
Battery Voltage & Capacity: 36V 5.1Ah	
Make & Model: YUNMAKE TDN02Z	
PAB Manufacturer: Hangzhou Yunmake Technology Co. Ltd.	
Battery Model: C1 C-SERIES	
Battery Manufacturer: Hangzhou Yunmake Technology Co. Ltd.	
Battery Voltage & Capacity: 36V 5.1Ah	

Make & Model: ZEBRA A5AH24	
PAB Manufacturer: Zhuhai Shuangye Electronic Technology Co. Ltd.	
Battery Model: 36V9AH	
Battery Manufacturer: Zhuhai Shuangye Electronic Technology Co. Ltd.	
Battery Voltage & Capacity: 36V 9Ah	