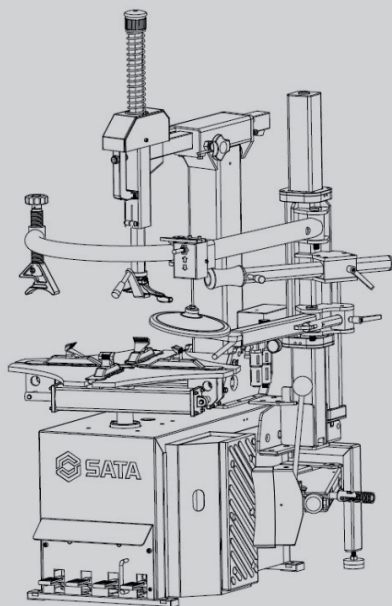




后倾式辅助臂扁平轮胎拆装机  
Tilt-back Tire Changer with Helper

AE1025H/AE1025H-3



使用说明书 \ User's Manual





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技术参数	外夹轮辋直径	内撑轮辋直径	适用最大轮辋宽度	适用最大轮胎直径	气缸最大推拉力
AE1025H	11-24"	13-26"	330mm	1080mm	2500 kgf
AE1025H-3					
技术参数	大盘转速	工作气压	工作噪音	外箱尺寸	毛净重
AE1025H	6 rpm	8-10 bar	≤ 70 db	1150*950*1020mm	288/263 Kg
				1150*520*300mm	88/75 Kg
AE1025H-3				1150*950*1020mm	288/263 Kg
				1150*520*300mm	88/75 Kg

开箱后即请检查产品，确保产品完好无损。如果发现有任何部件缺失或损坏；

请电话联系世达汽车科技（上海）有限公司客户服务部：400-820-3885、800-820-3885。

请记录产品序列号：\_\_\_\_\_

注：如果产品没有序列号，请记录购买日期。

请妥善保存本使用说明书：

- 1) 本使用说明书涉及产品的安全警告、安装操作、维护保养、常见故障处理等内容，请妥善保管。
- 2) 请记录本产品的序列号（或购买日期）在使用说明书首页，并将说明书保存于干燥安全之处以备参阅。
- 3) 请在完全理解本说明书内容的基础上，正确使用产品。
- 4) 本产品已经投保产品责任险。



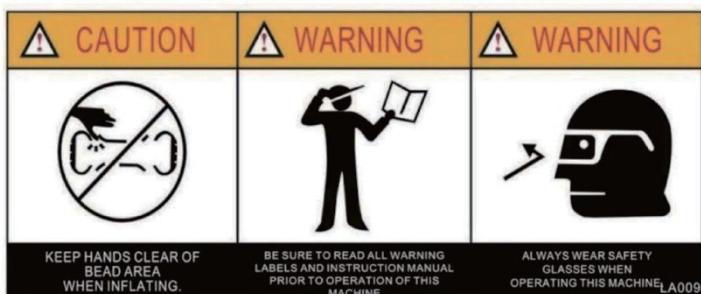
## 第一章 安全注意事项

- 不正确的操作可能导致人身伤害及设备损坏。
- 使用前请务必仔细阅读并理解说明书的全部内容。
- 请保证儿童与其他未经许可的人员远离工作区域。
- 确保设备连接到正确的电源和气源，并可靠接地。
- 请在平整、水平、干燥并能可靠承载的平面上使用本设备。
- 避免意外启动，在维修之前请确保设备已关闭，电气源断开。
- 将保护装置和安全装置保持在正确的位置，并保持正常工作。
- 保持工作区域清洁和良好的照明，混乱或黑暗区域会引发事故
- 严禁超载使用本产品，否则引起的事故责任不在保险范围之列。
- 请保持远离热源与火源，高温可能对本设备和密封元件造成损坏。
- 避免危险的环境，不要在潮湿的环境使用设备，或将其暴露在雨中。
- 严禁任何未经培训的人员使用本设备，且不得自行拆装或改装本设备。
- 确保车轮正确安装，按不同轮毂选择正确的方式将其锁紧固定在本设备上。
- 每次使用前都要仔细检查，如有漏油、零部件、附件松动或者损坏，都不能使用。
- 请让具有专业维修资质的专业人员合理维护设备，如需更换配件请使用原厂配件。
- 在操作时必须穿戴符合国家相关安全防护安全规定的安全鞋、防护眼镜和工作手套，推荐选用世达相关产品。
- 严禁在酒后、精神乏力、注意力不集中，受药物影响而困倦以及任何意识不清醒的情况下使用设备。

### 警告

**本手册中所包含的注意、警告、指示等信息不能涵盖所有可能发生的情况。操作人员必须明白日常谨慎操作和具备专业知识是在操作本产品时不可或缺的因素。**

## 1.1 警告标贴



操作中手要  
远离轮胎

操作时须佩戴  
好防护用品

使用前请仔细  
阅读说明书



小心触电!



注意：压胎时请勿用手接触轮胎侧壁



切勿将身体任何部位探入拆装头下方



夹紧轮辋时，请注意手和其他部位勿进入卡爪与轮辋间



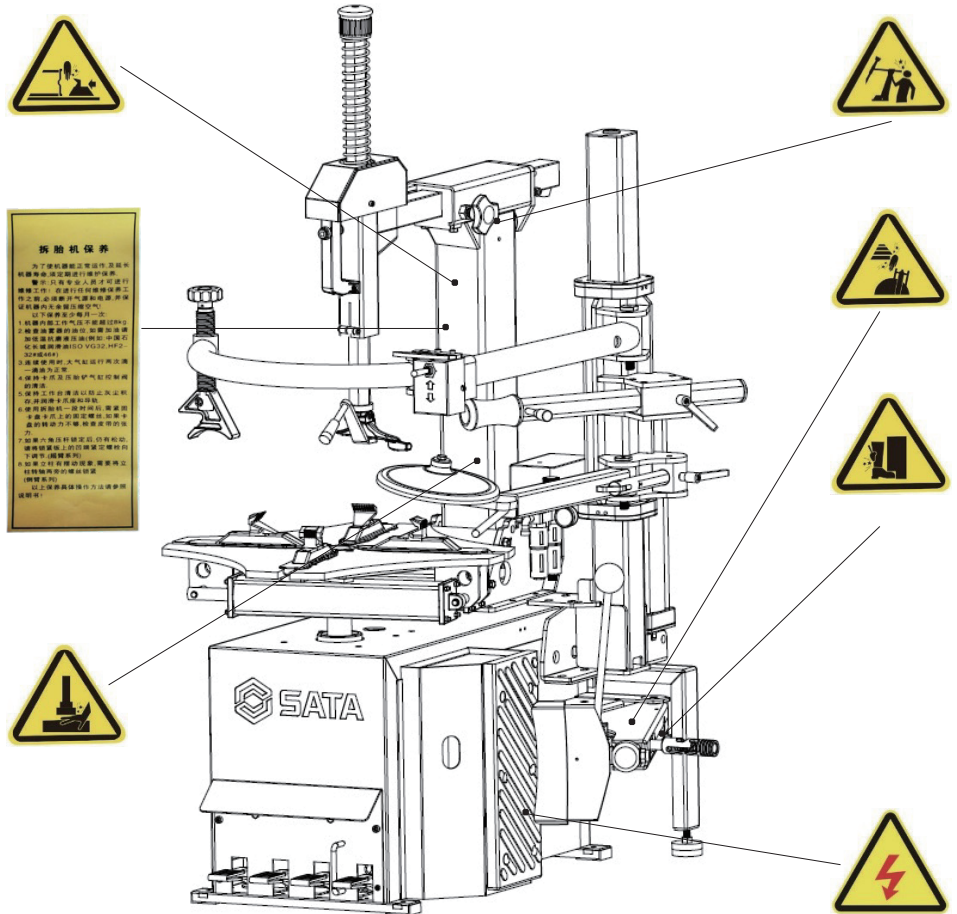
压胎时，请勿站立于铲刀和轮胎中间，以免受伤



小心立柱后仰伤人

## 1.2 安全标识位置示意图

- 注意保持安全标识的完整，模糊或丢失时，应立即更换新标识应使操作者清楚看见安全标识并须明确标识正确含义

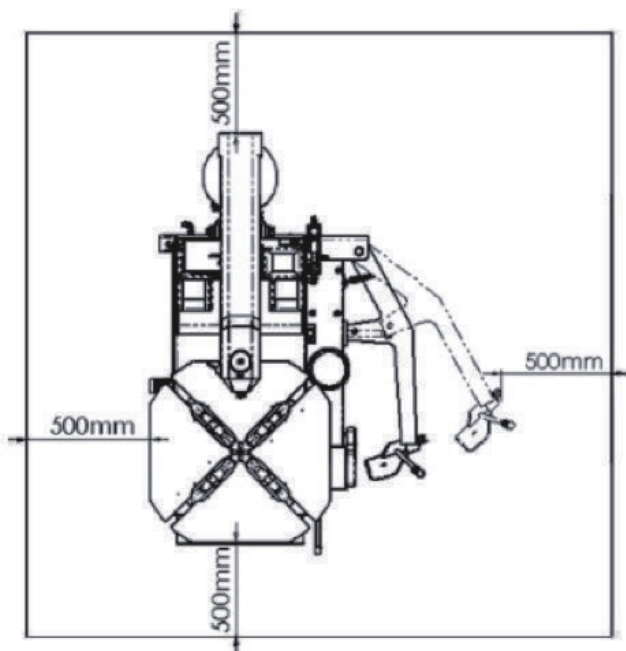


## 第二章 安装说明

拆胎机的安装必须由专业人员完成。安全和有效的使用取决于正确的安装。如果有问题请联系世达授权的经销商。

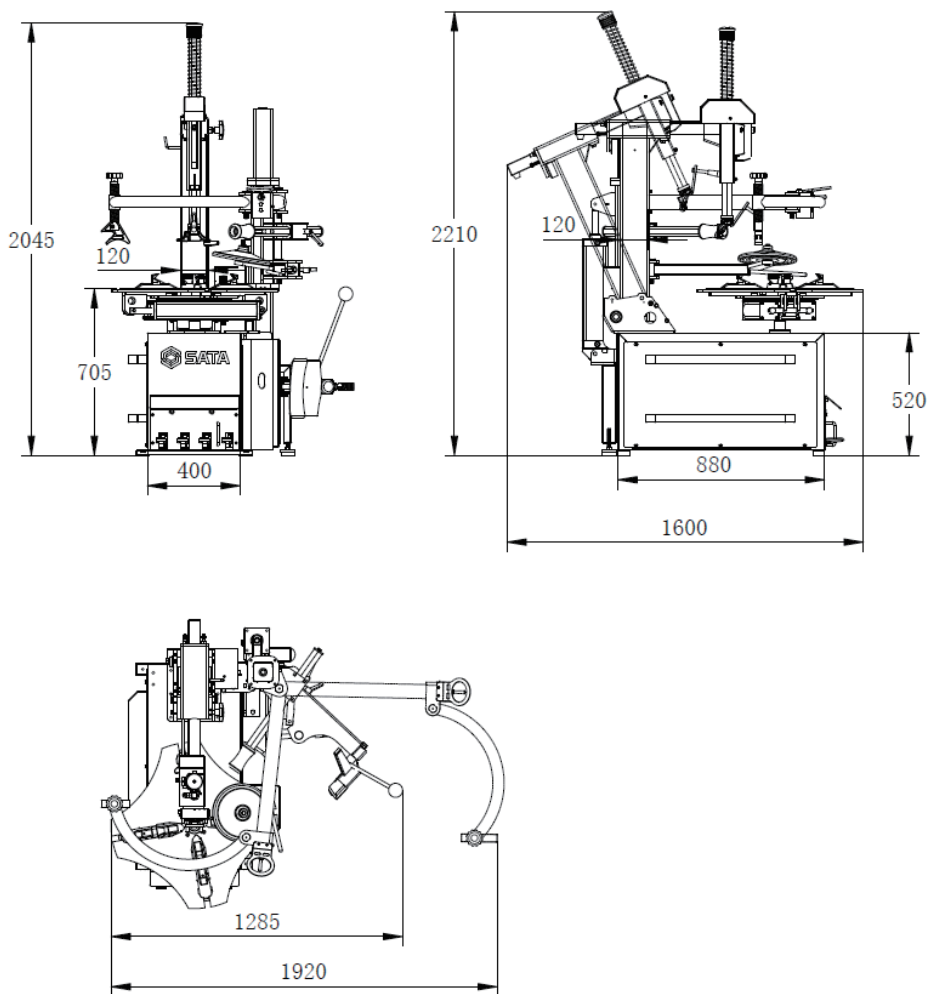
### 2.1 设备尺寸和使用空间

- 拆胎机必须放置在坚固的平面地板上，并使用螺栓固定。
- 安装拆胎机的位置，附近必须有电源和气源，一起连接。
- 适合放置拆胎机的位置，须在拆胎机周围留有足够的操作空间。
- 确保所选的位置上面和后面有足够的空间让辅助臂或倒臂正常工作
- 拆胎机右侧和正面至少留 500mm 的操作空间，以便拆装轮胎以及压胎工作。





AE1025H/AE1025H-3 尺寸图:

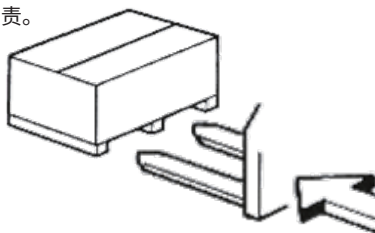


## 2.2 安全规则

- 本设备应由专业人员或经培训过的人员操作。
- 未经许可对设备（尤其是电气部分）进行动，本公司概不负责。
- 任何对电气部分的处理，只能由专业人员进行。

## 2.3 运输 / 拆箱

- 叉车搬运，搬动位置如右图所示。
- 拆去包装，检查设备是否受损。
- 将包装材料远离儿童放置，以免造成危险。

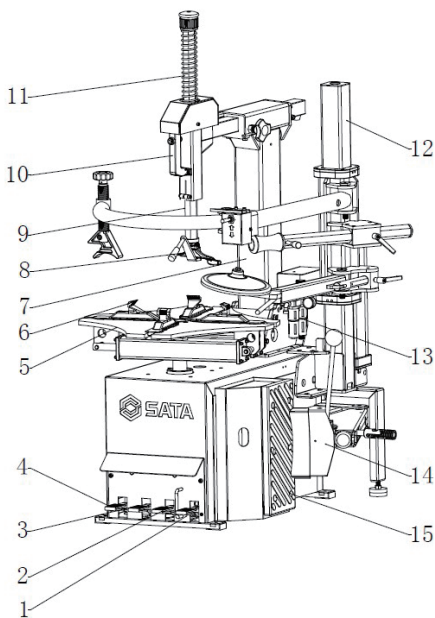


## 注意

设备表面都涂有一层特殊的防锈油，易沾上灰尘，必要时应尽量擦除。

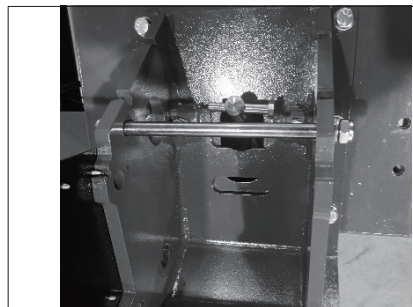
## 2.4 产品图

1. 转动脚踏
2. 压胎脚踏
3. 夹紧脚踏
4. 倒臂脚踏
5. 工作台
6. 卡爪
7. 立柱
8. 拆装头
9. 滑臂
10. 控制把手
11. 六角压杆
12. 辅助臂总成
13. 油雾器
14. 压胎铲臂
15. 压胎胶垫

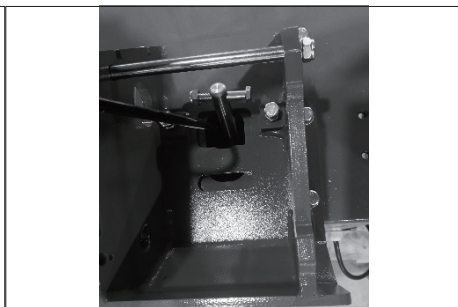


**2.5 标准配件：**

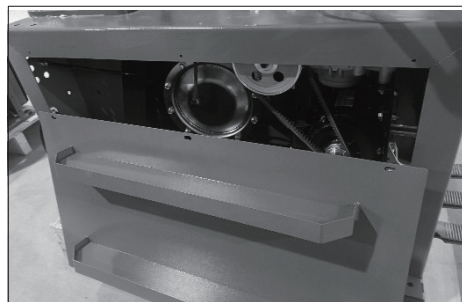
			
打气表	六角杆压簧帽	六角杆压簧	20 寸撬棍
			
拆装头填充垫 - 前 / 后	撬棍护套	立柱挂钩	说明书

**2.6 立柱安装**


a. 将后倾斜臂座上的立柱转轴卸下待装



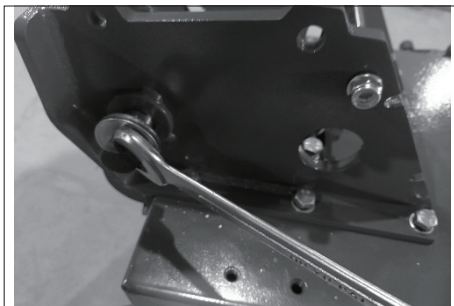
b. 将立柱上的气管穿过后倾斜臂座上的方槽中



c. 卸下机箱左侧面板的四个固定螺丝，将左侧面板取下



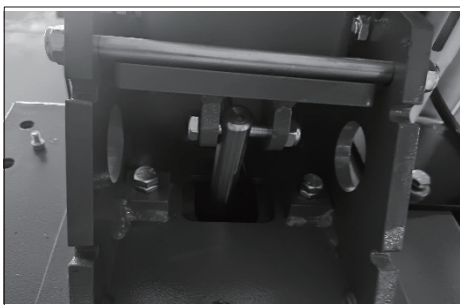
d. 将立柱上的气管与“8 转 6”接头相连，重新安装侧板



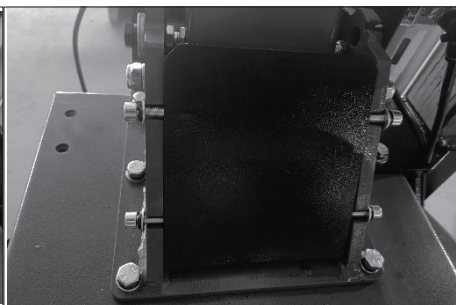
e. 将立柱转轴插入立柱中，用螺柱和垫圈固定



f. 将气缸杆用螺栓与立柱连接



g. 调节立柱两侧的定位螺丝



h. 安装立柱保护罩



## 2.7 电源连接

通电前应先检查网路电压是否与设备标签上所标的电压值一致

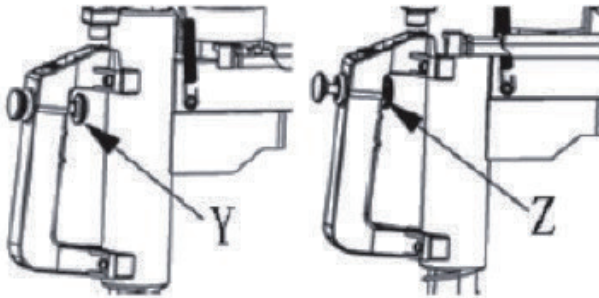
**- 非常重要：设备与电气系统相连接，该电气系统要配有线路保险，良好的接地要符合当地国家标准，必要时给设备配备漏电保护装置，以确保设备的安全运行。**

## 2.8 气源连接

- 1) 将夹紧脚踏踩下，确定大盘卡爪不会突然张开。
- 2) 用快速接头将气源连接至油水分离器。并调节压力表显示气压。
- 3) 将打气表用管连接至气源，并按压手柄确认充气功能正常。

## 2.9 整机测试

- 1) 踩下转动踏脚，大盘按顺时针方向转动。顶起踏脚，大盘按逆时针方向转动。
  - 2) 踩下夹紧踏脚，四个大盘卡爪张开，再次踩踏脚，卡爪闭合。
  - 3) 踩下压胎夹紧踏脚，靠胎铲进入工作状态，再次踩踏脚，靠胎铲返回原始位置。
  - 4) 踩下倒臂踏脚，立柱 U 后仰，再次踩踏脚，立柱回到工作位置。
  - 5) 按下把手按钮（Y 位置）拆胎臂和推拉臂被锁定，退回把手按钮（Z 位置），解除锁定。
  - 6) 检查是否是每踩下踏脚 3-4 次之后，油水分离器油滴 1 滴，如果不是的话，使用螺丝来进行调节。
- 说明：对于 380V 的设备型号，如果大盘的转动方向同上述的方向不同的话，则调换 3 相接线柱上的两根相线。



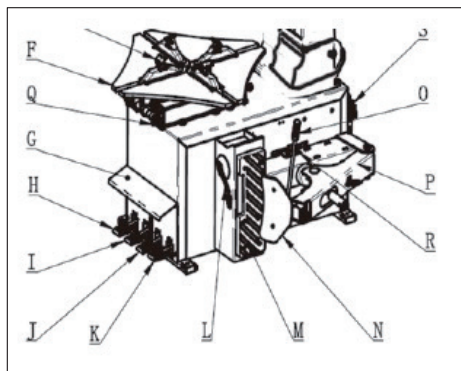
## 第三章 操作指南

3.1 在您阅读和理解整个手册和所提供的警告之后才能使用机器。在进行操作之前，放掉胎中的空气，并除去轮上的所有的铅块。轮胎拆装机的操作包括以下部分：a、靠胎；b、拆胎；c、装胎

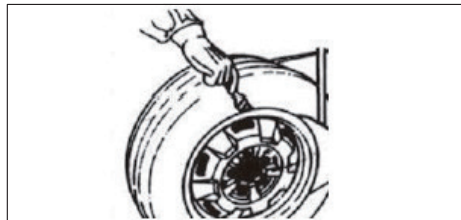
3.2 建议拆胎机配压力调节装置。

### 3.3 靠胎

- 在靠胎操作时要极度的小心。当靠胎踏脚驱动靠胎臂快速而有力的移动的时候，靠胎臂会对其移动的区域内的所有事物造成危险和压碎。
- 检查轮胎是否放气，如果没有的话，排空胎内空气。彻底合上大盘夹爪
- 靠胎时如果夹爪位于开放的位置，那对操作者的手将会是极其危险的。靠胎过程中千万不要使您的手同胎壁相接触。



将车轮靠在拆胎机箱体右侧的靠胎胶皮上。将靠胎铲顶在距离轮辋大约 1cm 距离的胎口上。注意靠胎铲要顶在轮胎上而不是顶在轮辋上。



踩下踏脚，移动靠胎铲，当靠胎铲达到其行程的尽头的时候或破开胎口的时候，松开踏脚轻轻的旋转轮胎直至轮胎彻底的从轮辋上拆胎

### 3.4 拆胎

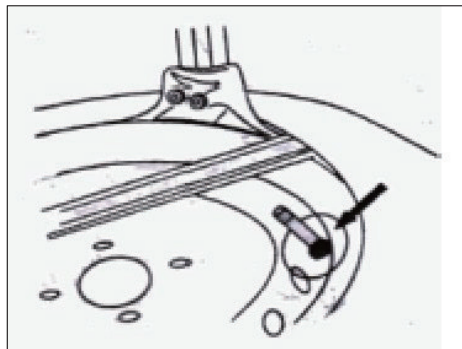
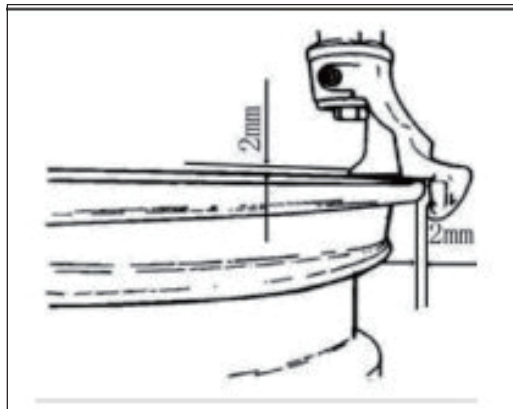
- 在操作之前要确保原有的所有的铅块被卸下，并检查轮胎的放气
- 立柱后仰的时候，确保没有人在拆胎机的后面
- 踩踏脚使立柱倾斜，以便于清洁大盘
- 将润滑脂（或类似的润滑脂）涂抹在胎口上不使用润滑脂将会导致对胎口的严重的损坏
- 在锁定轮辋的过程中，千万不要将您的手放在轮胎的下面。正确的固定操作是轮胎恰恰位于大盘的中央

### 3.5 外部撑夹

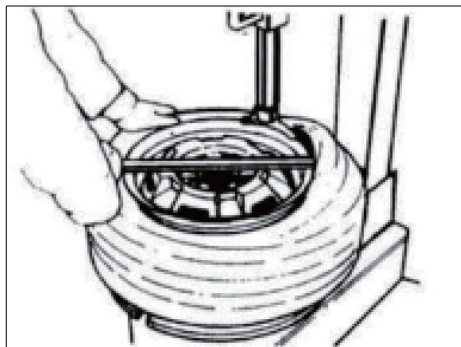
参照大盘上的将夹爪位置，进行放置轮胎，向下踩踏脚至中间位置将轮胎置于夹爪之上并向下压轮辋，踩踏脚（图 5-1 I）到极限位置。

### 3.6 内部撑夹

- 参照夹爪位置进行轮胎定位，使其彻底闭合将轮胎置于夹爪之上并向下压轮辋，踩踏脚使夹爪张开以夹住轮辋
- 确保轮辋被牢牢的固定在夹爪上
- 千万不要将您的手放在车轮的上面。立柱回位到工作位置会对操作者的手造成挤伤，使其夹在轮胎和轮辋之间
- 踩踏脚翻转立柱使锁紧按钮位于位置，解除拆胎臂 M 的锁定，将拆胎臂向下移动，使鸟头位于轮辋上部。将锁紧按钮置于位置，将整个拆胎总成锁定。这种锁定是水平和垂直两个方向上的锁定，拆胎头距离轮辋 2mm。将撬棍插在胎口和鸟头之间，使胎口在鸟头的上方移动
- 为避免损坏内胎，需使阀门位于拆胎头右侧，距离为 10cm
- 项链、手镯、宽松的衣物或移动部件附近的异物均会危及操作者



用撬棍将胎唇撬到拆装头头部的凸起部位上，点踩转盘转向脚踏（图 5-1 K）转盘顺时针旋转，直到上胎唇全部拆出。如果拆有内胎的轮胎，为了避免损坏内胎，在进行操作时，应使气门离开拆胎头右边 10cm 左右；



为了拆卸内胎，踩下踏脚使立柱倾斜，不解除拆胎臂的锁紧；重复此操作，破开另一侧的胎口。



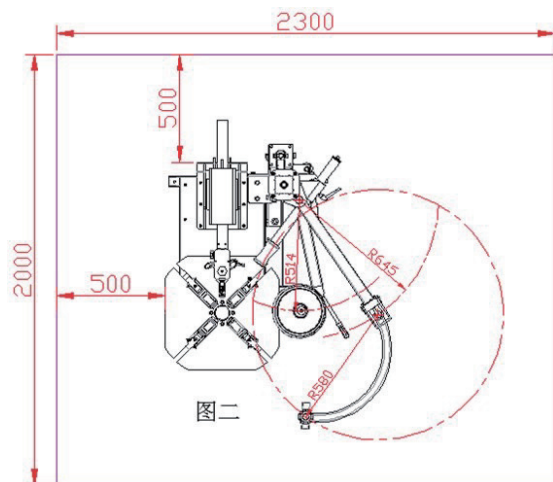
### 3.7 安装轮胎

- 最重要的是检查轮胎和轮辋，防止再充气过程中的爆炸。在开始安装操作之前要确保：轮胎和胎纹纤维没有受到损坏，如发现，不要安装轮胎；轮辋没有凹痕和翘曲肉眼观察，注意铝合金轮辋的内侧没有微小的划痕，这些是危险的，尤其是在充气的时候
- 使用专用的润滑脂进行胎口的润滑，以避免损坏胎口和便于操作在轮辋锁定的时候，不要将手放在轮胎的下面。正确的操作是使轮胎位于大盘的中央立柱倾斜的过程中要确保没有人站在立柱的后面
- 如果所拆装的轮辋的尺寸相同的话，就没有必要经常地锁紧拆胎臂或解除拆胎臂的锁紧，您所需要做的仅仅是将立柱后仰或恢复到工作的位置，拆胎臂保持在工作的位置
- 千万不要将您的手放在车轮的上面。立柱回位到工作位置会对操作者的手造成挤伤，使其夹在轮胎和轮辋之间
- 移动轮胎使胎口在鸟头前端下方经过，胎口翘起的部分顶在鸟头后部用手将胎口按进轮辋的槽内。踩踏脚使得大盘按照顺时针旋转。持续此操作，直至轮胎完全装入轮辋。
- 为防止工业事故，在大盘转动的时候使手和身体的其他的部分尽可能的远离拆胎臂放入内胎，重复上述的操作
- 拆装轮胎的时候，大盘要按照顺时针的方向转动。逆时针的转动仅在机器熄火导致操作者发生错误的时候为了纠错而使用



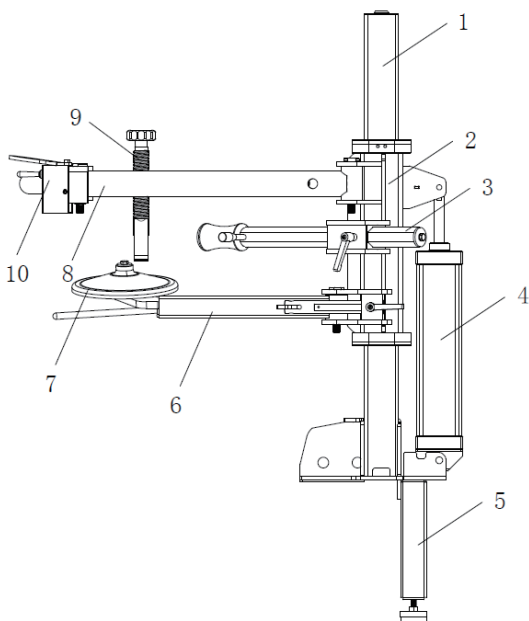
## 第四章 辅助臂的安装与操作

### 4.1 辅助臂的尺寸和使用空间

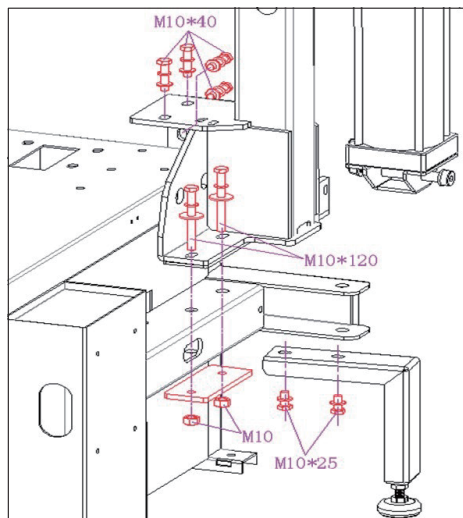


### 4.2 各组成部件

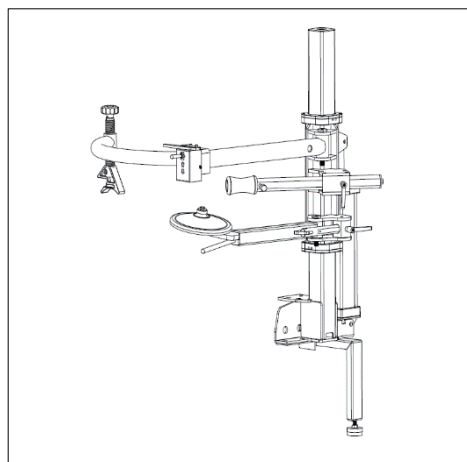
1. 立柱
2. 升降滑座
3. 滚轮滑杆 (固定压胎臂)
4. 升降气缸
5. 支撑地脚
6. 托胎臂
7. 托胎盘
8. 圆横臂 (旋转压胎横臂)
9. 压胎丝杆
10. 控制阀



### 4.3 安装



- 1) 将辅助臂用 4 个外六角圆柱头螺栓 M10\*40、2 个外六角圆柱头螺栓 M10\*120、2 个 M10 自锁螺母固定在机箱相应的孔位上，用外六角圆柱头螺栓 M10\*25 连接支撑脚到立柱导轨上。



- 2) 将旋转压胎臂，固定压胎臂和托胎臂安装与滑套组件上，再插上相对应的气管。

### 4.4 操作说明

控制手柄用于控制压胎块与压胎轮的上升和下降，以适应装拆轮胎的高度。

#### 4.5 压胎铲安装



1. 取出压胎铲，卸下压胎铲轴上的垫片与锁紧螺母
2. 将压胎铲轴穿入铲臂转轴中
3. 装上垫片与锁紧螺母，用扳手锁紧

## 第五章 存储

当设备需长时间贮存时，请断开电源和气源。润滑所有需润滑的部件：滑块、大盘上的滑块槽，辅助臂安装处。排空所有的油 / 液体存储器。将设备套上塑料罩以防尘。

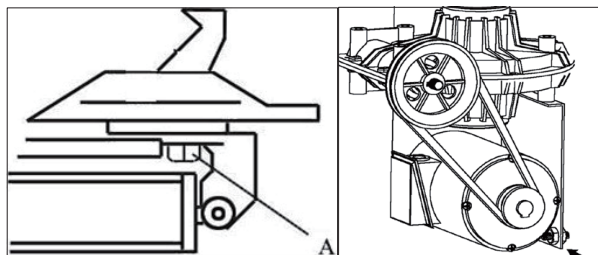
## 第六章 报废

当设备寿命已尽，不能再使用时，请按照当地有关法规妥善处理。

## 第七章 日常保养

为了延长机器使用寿命，应按说明书要求定期进行维护保养。否则，机器的运行可靠性将受影响，致使操作者和机器附近人员可能受到伤害。警示：在进行任何维修保养工作之前，必须断开气源和电源，并且踩3-4下踏板排完机器内的余留压缩空气。损坏部件必须由专业维修人员用原厂提供的备件更换。

- 1) 保持卡爪及压胎铲气缸控制阀的清洁。
- 2) 使用机器 20 天后，重新紧固卡盘卡爪上的固定螺钉 (A)。
- 3) 如果爪盘的转动动力不够，按以下检查皮带的张力。松开机身左侧侧板的螺钉，拆下侧板，调整安装电动机的两颗调节螺钉，使调节支架和电机座的距离合适，然后紧固螺钉，以达到张紧驱动皮带的作用。
- 4) 为了卡爪及压胎铲大气缸的开 / 合可靠，应保持与其相连的控制阀的清洁，可按以下说明进行维护。卸除机身左侧板的 4 颗螺钉，拆下侧板；松开卡爪开 / 合或大气缸控制踏板上的阀体消声器。
- 5) 用压缩空气清洁消声器上的污物，若已损坏，参见备件表更换。



- 6) 气压不超过 10Ba。
- 7) 保持工作台清洁以防止灰尘积存，并润滑卡爪座和导轨。
- 8) 如果摆臂没有锁定或没有达到工作所需的尺寸，需要对摆臂锁紧板进行调节。
- 9) 如果立柱有摆动现象，需要将立柱转轴两旁的螺丝锁紧。
- 10) 检查油雾器油缸的油位，如需加油，用内六角扳手松开螺钉，或逆时针拧开油缸进行加油，只能使牌号 VG32 润滑油，在接上压缩空气的情况下，第一次踩 1 下踏板，看油雾器是否滴第一滴油，连续使用时，踩一下踏板，看油雾器是否滴一滴油。



拔出盖子，旋转可调节压力，压力设定范围为8-10Bar



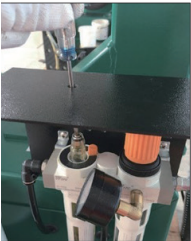
压下盖子，锁定压力



定时检查汽水分离器水位高度，请勿超过分离器50%高度，必要时可转动锁紧钮，人工排水。



每天检查润滑油液位，需要时可打开油盖添加。注意，禁止使用长期暴露于空气中的润滑油。



每天检查润滑状况，确保踩压脚踏时润滑油滴入油雾器中。必要时可使用螺丝刀调整油雾器调节螺丝。

## 第八章 故障以及排除

### 8.1 工作盘不动

检修思路：首先分清是电路故障还是机械故障。

检修方法：

- 踩下或提起倒顺开关脚踏，观察电机的反应，如果没有任何反应，用万用表测量倒顺开关，接线端之间电压是否正常，不正常检查供电线路或电源插头，若电压正常，用万用表测量倒顺开关接线端和接线端在踩下和提起电源开关脚踏时，电压是否正常，如果不正常，倒顺开关坏，如果正常，电机或电容坏。
- 如果电机有嗡嗡声，但不能转，测量方法同上面。如果测量结果不正常，倒顺开关坏，如果正常，用手转动变速箱带轮，如果用手转不动，变速箱有故障，如果用手能转动，是电机或电容故障。
- 如果电机能正常转动，工作圆盘不转动，应是变速箱故障，如：变速箱皮带轮没带动蜗杆旋转：蜗轮崩出等。

### 8.2 拆胎无力

检修方法：拆胎时观察电机的工作情况，如果拆胎时，不能转动，说明电机力矩太小或电容有故障，如果电机能转动，但皮带轮在打滑说明是皮带过松所致，只需调紧皮带即可。

### 8.3 卡爪卡不死钢圈

检修方法：检查供气气压是否符合说明书的要求，如果符合要求，检查漏气或窜气，如果没有漏气和窜气和窜气现象就是卡爪同心高不好。

### 8.4 大气缸不能压胎

检修思路：如果是压胎无力（包括空载时大气缸能活动，压胎时压不松），一般是气压低，漏气，大气缸窜气，如果空载大气缸不能活动，一般是压缩空气没有加在大气缸的压胎端。

- 检查供气气压是否符合说明书的要求，如果符合要求检查大气缸是否漏气，检查控制大气缸两端的气管，接通气源，五通阀上的两根气管中的一根应该有气出来，当踩下压胎脚踏时，另一根气管应该有气出来，如果不正常，应换五通阀或调整五通阀的安装位置，使之工作正常。
- 检查五通阀正常的话，把复位端的气管接上，在压胎工作端的接咀上没有气出来为正常，如果有气出来，说明大气缸活塞裂或是密封圈磨损。
- 检查气压：用气压表检查油雾器的进气端的气压是否符合说明书的要求，如果进气端气压不够，调大空压机供气，如果进气端气压符合要求，出气端气压不够，调节油雾器的调压旋钮，如果调节调压旋钮不起作用，更换油雾器。

### 8.5 拆胎头刮钢圈吃胎

- 六方柱销锁不紧
- 拆胎头螺丝松动或方向位置不对
- 六方柱与六方套间隙大检修方法：
  - 拆胎头螺丝松动的调整：先预装紧（不要太紧）螺丝，再装紧螺丝，在装紧螺丝的时候，应装上一个中等尺寸的轮胎，让拆胎头滚轮靠在钢圈上，转动拆胎头的方向使之与钢圈的弧度相吻合，再紧固，最后把拧紧。
- 如果用手扳动六方柱，摆动比较大的话，更换摇臂。

### 8.6 卡爪张不开或收不拢：

检查不无漏气，检进五通阀芯是否跳出脚踏拨叉外，若以上正常，检查旋转配报导阀不无窜气，拆下旋转配报导阀连到小气缸的气管，在脚踏没有踩下或者说完全踩下时，旋转配气阀连到小气缸的气管只有其中一根有气出来，任何情况下两根气管不同时出气的现象就是旋转配气阀窜气，如果以上部件都没问题，检查扒机械部分，卡爪座有无变形，卡死，方形转盘有无卡死，方形转盘有无卡死，方形转盘销有无脱落。

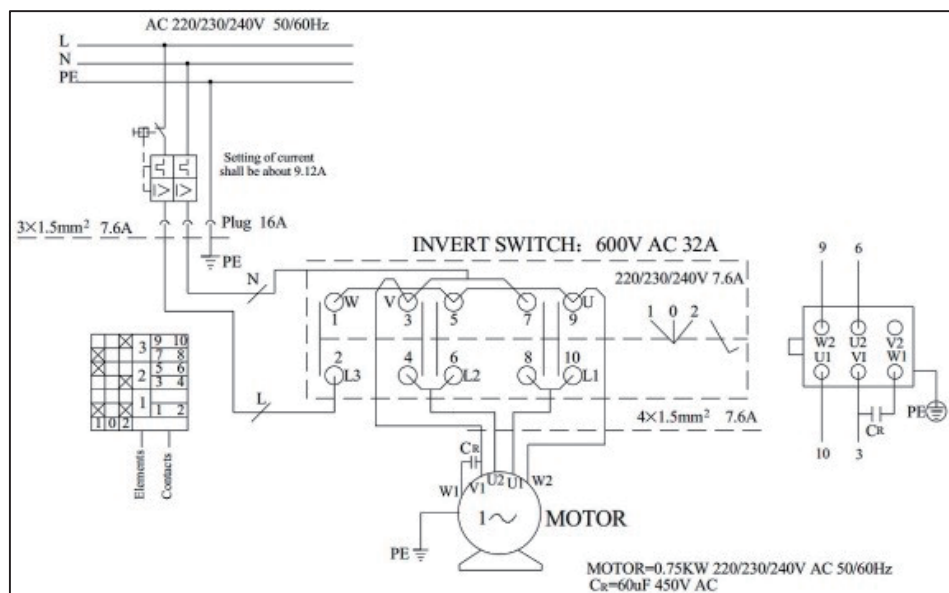
### 8.7 一般常见的故障排除法

故障现象	故障原因	排除方法
拆装头刮轮辋 / 吃胎	立柱松动导致拆装头位移	锁紧立柱
	摇臂 / 滑臂松动导致拆装头位移	调整摇臂 / 滑臂间隙
	六方杆间隙大导致拆装头位移	调整六方杆间隙
	拆装头松动	锁紧拆装头
	拆装头塑料垫片脱落	安装塑料垫片
	拆装头与轮辋间隙过小	调整拆装头与轮辋间隙 2-4mm
卡爪夹不紧轮辋	夹紧气缸漏气 / 窜气	检查气管接头 / 更换密封圈
	旋转配气阀漏气 / 窜气	检查气管接头 / 更换密封圈
	五通位置不对 / 漏气 / 窜气	调节五通阀位置 / 更换 O 型密封圈
	油雾器气压过小	调节油雾器压力 / 检查气源压力
	四个卡爪不同心 / 损坏	调整卡爪距离和偏心轴瓦 / 更换卡爪
大气缸无力	大气缸漏气 / 窜气	检查气管接头 / 更换密封圈
	五通位置不对 / 漏气 / 窜气	调节五通阀位置 / 更换 O 型密封圈
	油雾器气压过小	调节油雾器压力 / 检查气源压力
	气缸进气慢	调节五通阀脚踏限位螺丝
电机无力	220V 电机启动电容损坏	更换电容
	380V 电源缺相	检查电源相位
	皮带松	调紧皮带
电机不转	220V 电机启动电容损坏	更换电容
	380V 电源缺相	检查电源相位
	开关损坏或接线错误	检查开关接线 / 更换开关
	没有电源或插头没接触好	检查电源 / 更换插头
六方杆锁不紧	锁紧板间隙大	调整锁紧板间隙

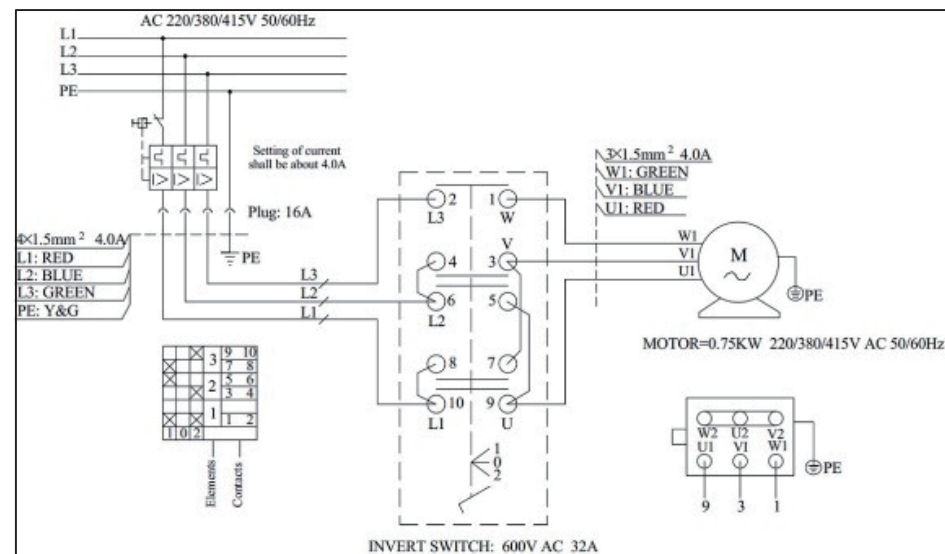
故障现象	故障原因	排除方法
滑臂间隙大	上下滚轮轴承和侧边顶丝位置不对	调整位置
气缸窜气	活塞密封圈损坏 / 气管接头损坏	更换
气缸漏气	O 型密封圈损坏 / 活塞杆刮伤 / 气管接头损坏	更换
五通阀漏气	O 型密封圈损坏 / 气管接头损坏	更换
五通阀窜气	O 型密封圈损坏	更换
油雾器漏气	型密封圈损坏 / 有异物 / 气管接头损坏	更换 / 清理异物
油雾器不滴油	调节滴油量太少 / 无油	加大滴油量 / 加油
旋转配气阀漏气	O 型密封圈损坏 / 气管接头损坏	更换
旋转配气阀窜气	O 型密封圈损坏	更换
卡爪张开收不拢 / 抖动	有异物 / 无润滑油 / 卡爪座变形	清理异物 / 加油润滑 / 更换
皮带容易损坏	皮带过紧 / 皮带轮与皮带盘不水平 / 过度使用	调整位置与水平 / 更换
开关正反转相反	接错线	重新连接 / 更换
减速箱噪音大	螺丝松动 / 无润滑油 / 轴承损坏	锁紧螺丝 / 加油润滑 / 更换



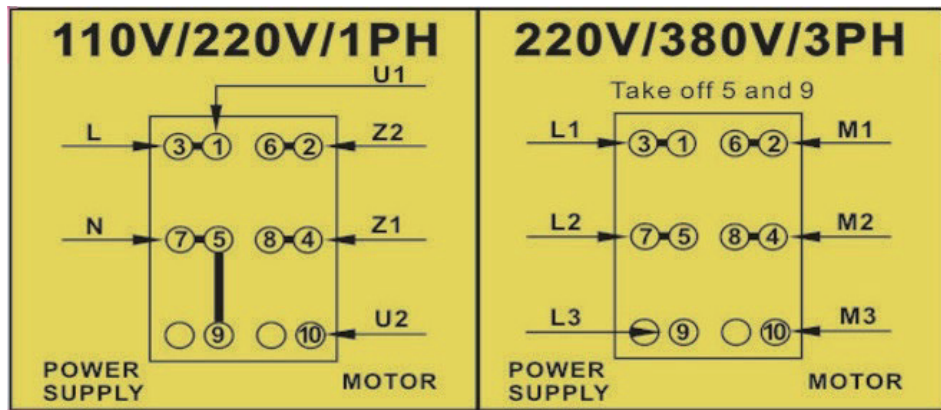
## 第九章 电路和气路图



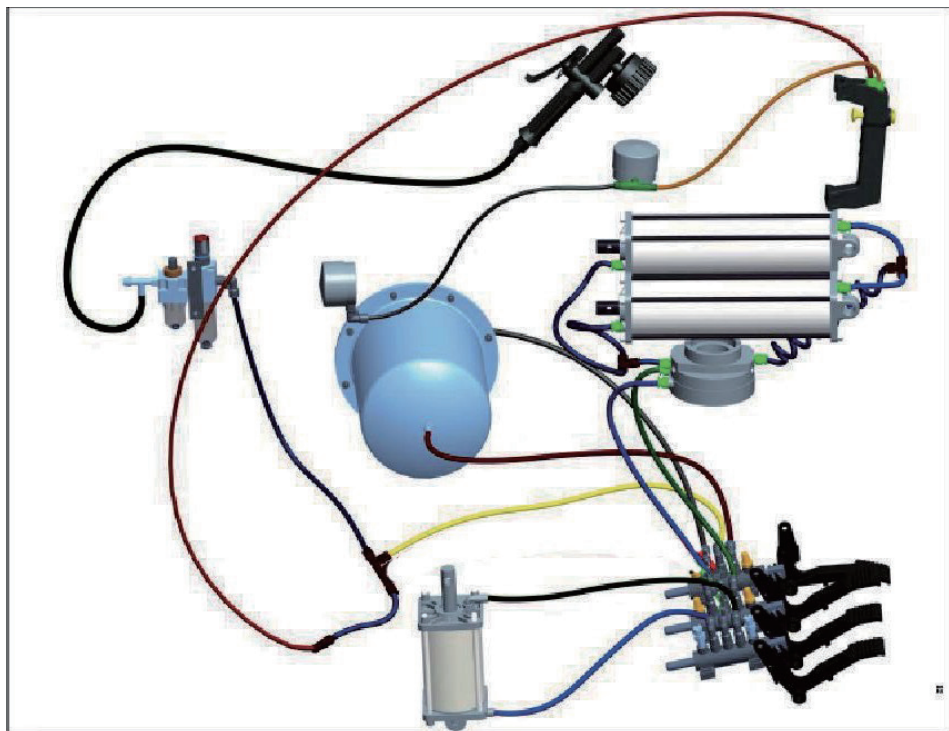
220V



380V

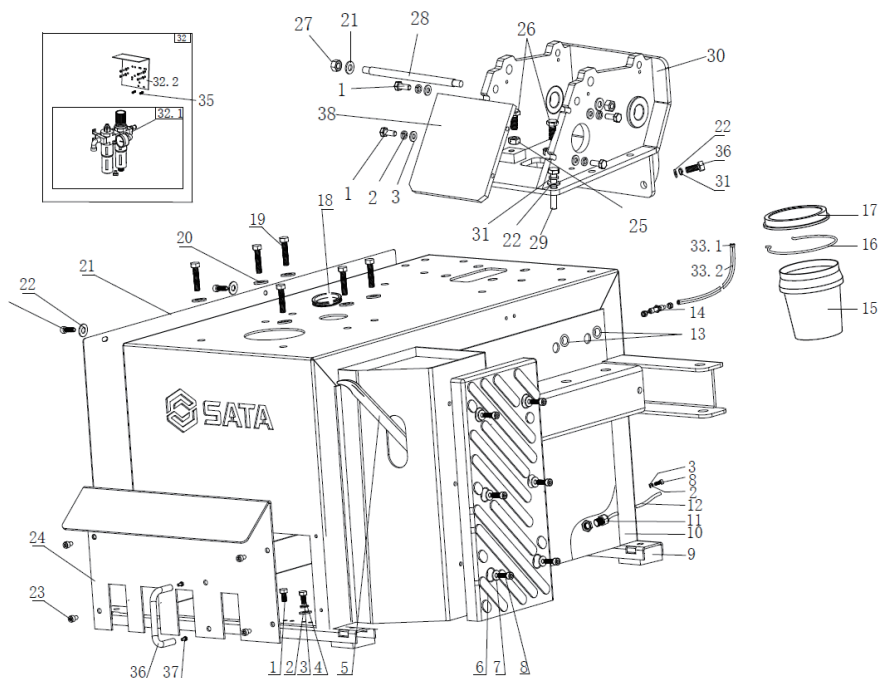


关接线图 220V/380V(99\*474)



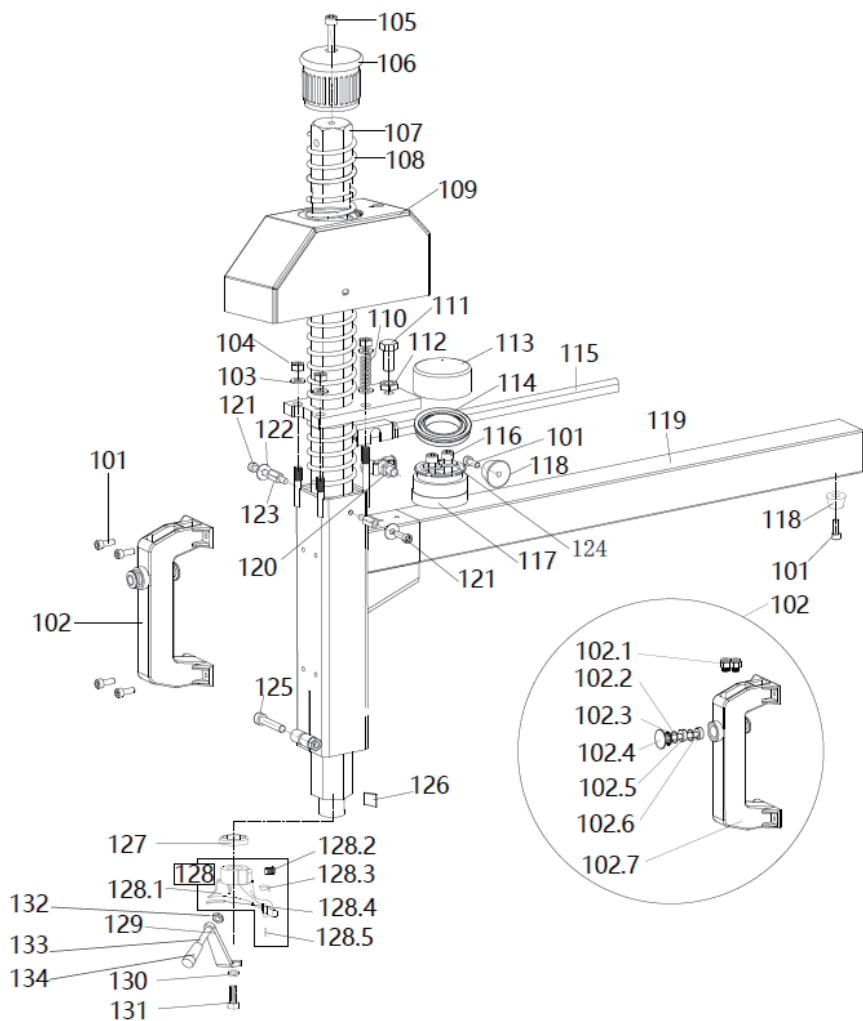
## 第十章 产品爆炸图

### 1、箱体总成：

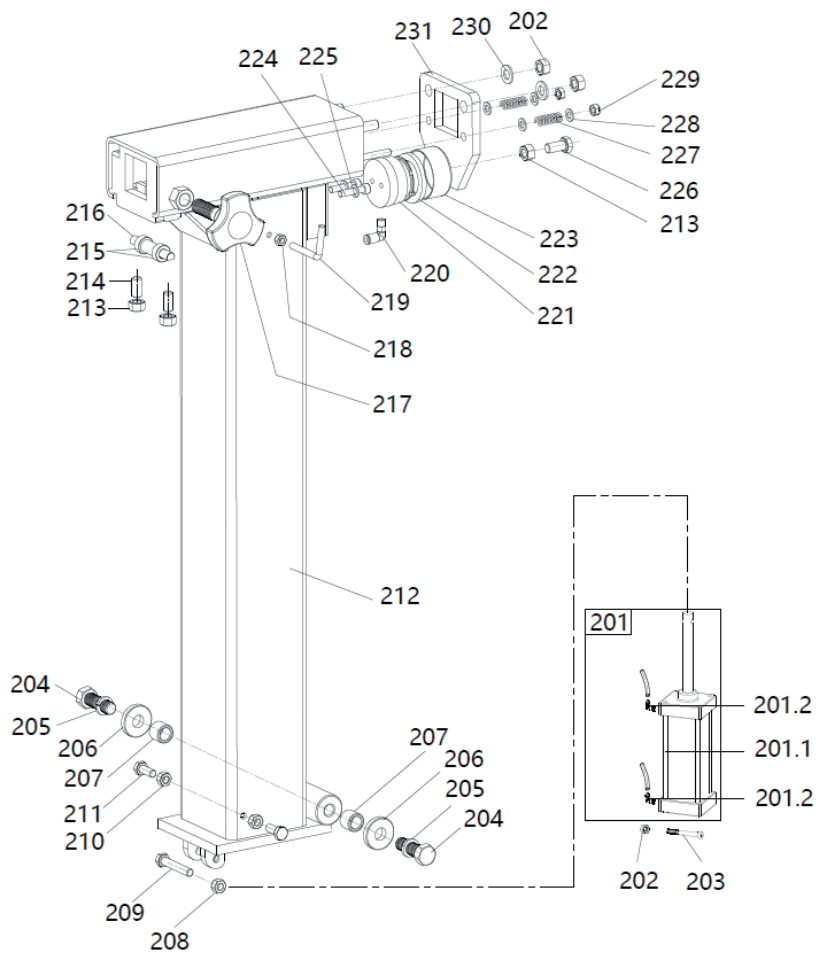


图号	配件物料号	名称	数量
1	PAE1021-108	外六角螺栓 M8*20	4
2	PAE1021-113	弹性垫圈 φ8	4
3	PAE1021-110	平垫圈 φ8	4
4	PAE1024-01	外六角螺栓 M8*16	1
5	PAE1021-5	撬杆 20"	1
7	PAE1024-02	压胎胶板	1
8	PAE1021-114	平垫圈 φ8	6
9	PAE1021-308	内六角圆柱头螺栓 M8*20	9
10	PAE1021-10	橡胶脚垫	4
11	PAE1022-11	机箱	1
12	PAE1021-12	电缆螺丝 G13.5	1
13	PAE1021-13	带插头电源线 3.0m	1
14	PAE1021-14	护线圈 φ16	2
15	PAE1021-15	快拧隔板直通 2*8*5	1
16	PAE1021-16	圆形油桶	1
17	PAE1021-17	油盒架	1
18	PAE1021-18	圆形油盒盖	1
19	PAE1021-19	护线圈 φ45	1
20	PAE1021-20	外六角螺栓 M10*160	6
21	PAE2021-209	平垫圈 φ10	12
22	PAE1024-03	左侧板组件	1
23	PAE2021-311	平垫圈 φ6	2
24	PAE1021-24	内六角圆柱头螺栓 M6*10	12
25	PAE1025-29	前盖 (倒臂)	1
26	PAE1021-620	螺母 [白] M10	2
27	PAE1022-H49	外六角螺栓 M10*40	2
28	PAE1022-208	自锁螺母 M10	2
29	PAE1023H-29	调节螺杆	1
30	PAE1021-135	外六角螺栓 M10*60(半牙)	4
31	PAE1025-02	倒臂支座	1
32	PAE2021-208	弹性垫圈 φ10	6
33	PAE1025-30	油雾器总成 (带支架)	1
33.1	PAE1021-33A	油雾器总成 (不带支架)	1
33.2	PAE1025-28	油雾器支架	1
34.1	PAE1021-34A	快速母头 SP20-T	1
34.2	PAE1021-34B	弹簧管 UC φ8*5-5	1
35	PAE2021-405	内六角圆柱头螺栓 M6*16	2
36	PAE1021-127	外六角螺栓 M10*25	2
37	PAE1021-35	圆钢 U 型拉手 φ10	1
38	PAE2021-118	十字槽半圆头带垫螺钉 M4*10	2
39	PAE1025-03	倒臂支座前盖板	1

## 2、滑臂总成：



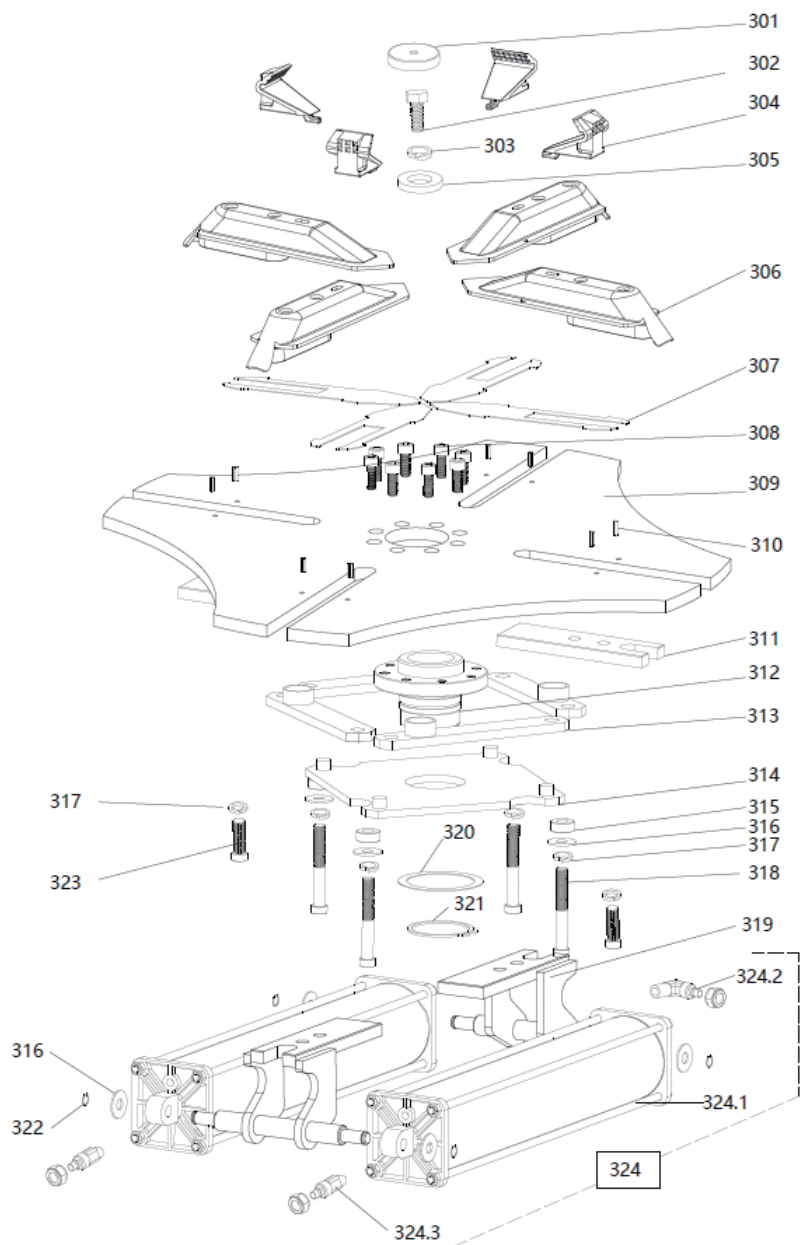
图号	配件物料号	名称	数量
101	PAE2021-405	内六角圆柱头螺钉 M6×16	13
102	PAE1022-114	控制手柄总成	1
102.1	PAE1022-113	快插 1/8-φ6	2
102.2	PAE1022-115	控制手柄 O 型密封圈 7.5*2.65	4
102.3	PAE1022-116	控制手柄阀封盖	1
102.4	PAE1022-117	控制手柄阀杆帽	2
102.5	PAE1022-118	控制手柄隔套	3
102.6	PAE1022-119	阀杆	1
102.7	PAE1022-120	控制手柄	1
103	PAE1021-114	平垫圈 φ8	6
104	PAE1021-716	自锁螺母 M8	5
105	PAE1021-118	内六角圆柱头螺钉 M8×40	1
106	PAE1021-102	六角压杆帽 S40	1
107	PAE1023H-127	六角压杆	1
108	PAE1021-104	压杆弹簧 φ3.5*55*600	1
109	PAE1025-04	锁紧板护罩	1
110	PAE1022-107	锁紧弹簧	2
111	PAE1021-323	外六角螺栓 M12*35	1
112	PAE1021-107	螺母 M12	1
113	PAE1022-130	锁紧气缸体	1
114	PAE1022-133	锁紧气缸 -V 型密封圈 60*50*6.5	1
115	PAE1022-136	气管导向槽	1
116	PAE1022-131	内六角圆柱头螺栓 M6*40	2
117	PAE1022-134	锁紧气缸 - 活塞 (橡胶)	1
118	PAE1022-137	环保垫脚锥形 32*25*20	2
119	PAE1025-05	滑臂	1
120	PAE1022-110	快拧三通 1/8-2"φ6*4	1
121	PAE1025-06	内六角圆柱头螺栓 M6*12	2
122	PAE1021-114	平垫圈 φ8	2
123	PAE1025-07	M6 镀锌锌单头六角铁柱	2
124	PAE1022-132	锁紧气缸密封垫	2
125	PAE1021-118	内六角圆柱头螺钉 M8×40	1
126	PAE1021-116	六方杆鸟头锰钢垫	1
127	PAE1021-120	防震垫 S40*50*10	1
128	PAE1022-125	拆装头总成	1
128.1	PAE1022-125A	拆装头	1
128.2	PAE1021-125	内六角凹端紧定螺钉 12*16	4
128.3	PAE1021-121	拆装头填充垫 - 前	1
128.4	PAE1021-122	拆装头填充垫 - 后	1
128.5	PAE1021-124	圆柱销 M5*24	1
129	PAE1025-08	六方杆下压板	1
130	PAE2021-208	弹性垫圈 φ10	1
131	PAE1021-127	外六角螺栓 M10*25	1
132	PAE1021-625	螺母 M10	1
133	PAE1025-09	双头丝杆 M10*80	1
134	PAE1025-10	胶木长手柄套 M10*50	1

**3、立柱总成:**




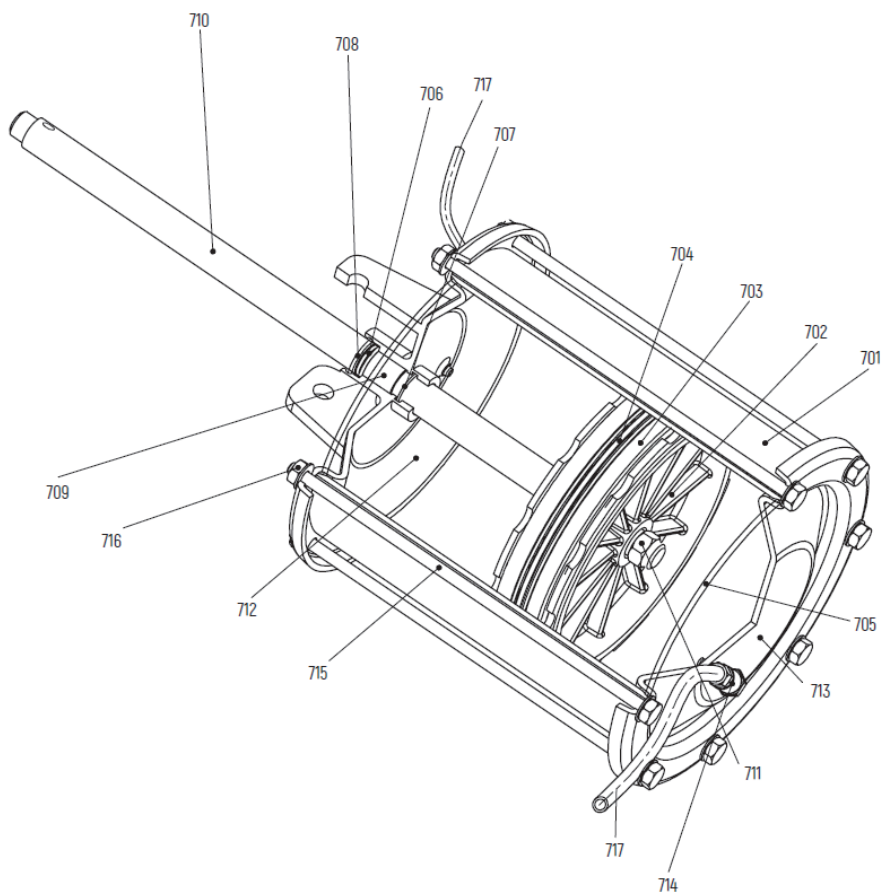
序号	配件物料号	名称	数量
201	PAE1022-201	倒臂气缸总成	1
201.1	PAE1025-11	气缸 80*100	1
201.2	PAE1021-324B	快拧弯头 1/8-φ8*5	2
202	PAE1022-202	自锁螺母 M12	3
203	PAE1022-203	内六角圆柱头螺栓 M12*140	1
204	PAE1025-12	外六角螺栓 M16*55	2
205	PAE1021-303	弹性垫圈 Ø16	2
206	PAE1021-131	工作台大垫圈	2
207	PAE1025-13	轴套轴承	2
208	PAE1022-208	自锁螺母 M10	1
209	PAE1021-135	外六角螺栓 M10*60	1
210	PAE1021-625	螺母 M10	2
211	PAE1021-127	外六角螺栓 M10*25	2
212	PAE1025-14	四方立柱	1
213	PAE1021-107	螺母 M12	2
214	PAE1025-15	内六角平端紧定螺钉 M12*20	2
215	PAE1025-16	轴套轴承	2
216	PAE1025-17	滑臂滚轮销	1
217	PAE1025-18	倒臂锁紧手柄	1
218	PAE2021-126	螺母 M8	2
219	PAE1021-133	立柱挂钩	1
220	PAE1022-221	快插弯头 1/8-φ6	1
221	PAE1022-134	锁紧气缸 - 活塞	1
222	PAE1022-133	锁紧气缸 -V 型密封圈 60*50*6.5	1
223	PAE1022-130	锁紧气缸体	1
224	PAE1022-131	内六角圆柱头螺栓 M6*40	2
225	PAE1022-132	锁紧气缸密封垫	2
226	PAE1021-323	外六角螺栓 M12*35	1
227	PAE1022-107	锁紧弹簧	2
228	PAE1021-114	平垫圈 φ8	4
229	PAE1021-716	自锁螺母 M8	2
230	PAE1021-316	平垫圈 φ12	2
231	PAE1025-19	滑臂锁紧板	1

## 4、工作台总成:



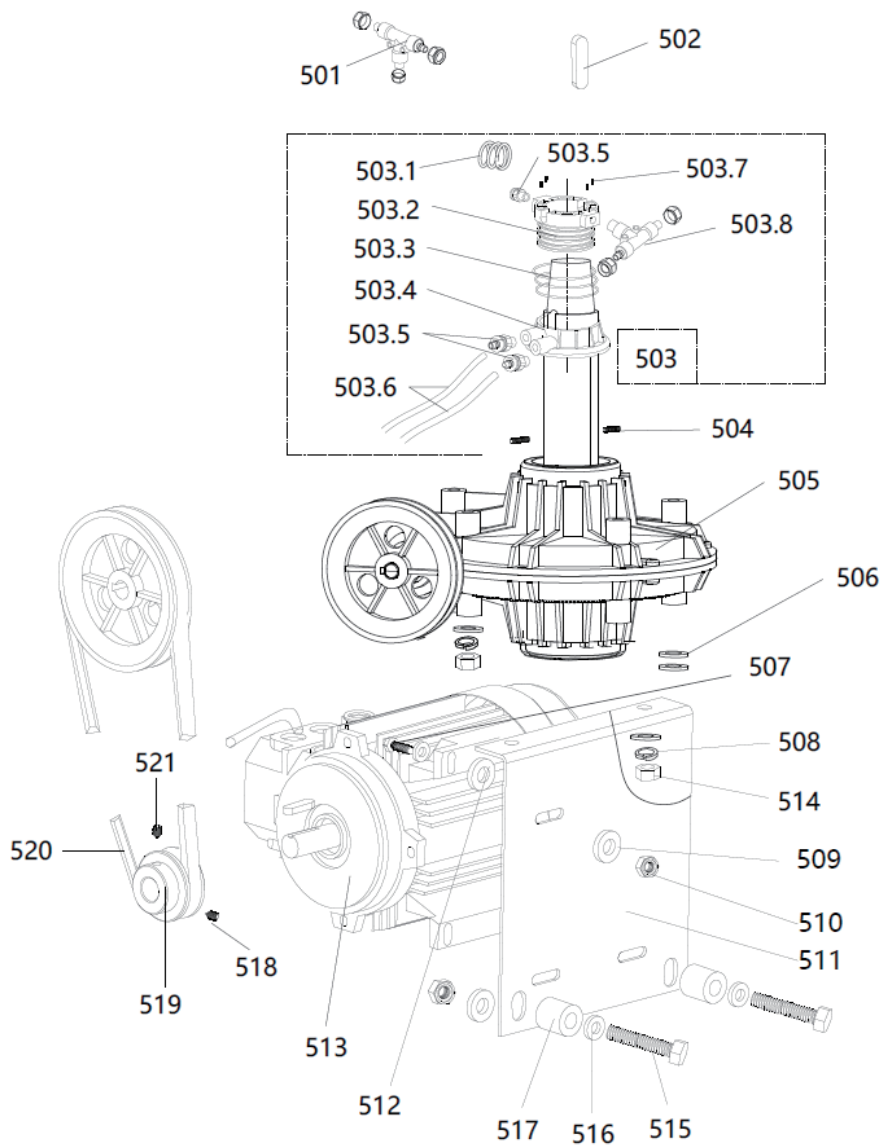
序号	配件物料号	名称	数量
301	PAE1021-301	工作平台封盖	1
302	PAE1021-302	外六角螺栓 M16*40	1
303	PAE1021-303	弹性垫圈 $\phi$ 16	1
304	PAE1021-304	卡爪	4
305	PAE1021-131	工作台大垫圈	1
306	PAE1023H-306	卡爪座帽组件	4
307	PAE1023H-307	导向片	4
308	PAE1021-308	内六角圆柱头螺栓 M8*20	8
309	PAE1025-20	工作台板	1
310	PAE1021-310	弹性销 5*16	8
311	PAE1023H-311	座下板	4
312	PAE1021-312	工作台锥套	1
313	PAE1023H-313	拉条组件	4
314	PAE1023H-314	方形转盘组件	1
315	PAE1021-315	拉杆条销套	4
316	PAE1021-316	平垫圈 $\phi$ 12*24*2	8
317	PAE1021-317	弹性垫圈 $\phi$ 12	8
318	PAE1021-318	外六角螺栓 M12*80	4
319	PAE1023H-319	C型卡爪座总成	4
320	PAE1021-320	方形转盘垫片	1
321	PAE1021-321	卡簧 [ 轴用 ] $\phi$ 65	1
322	PAE1021-322	卡簧 [ 轴用 ] $\phi$ 12	4
323	PAE1021-323	外六角螺栓 M12*35	4
324	PAE1025-21	夹紧气缸总成 80*390	2
324.1	PAE1025-22	气缸 80*390	2
324.2	PAE1021-324B	快拧弯头 1/8- $\phi$ 8*5	2
324.3	PAE1021-324C	快拧直通 1/8- $\phi$ 8*5	2

5 大气缸总成:



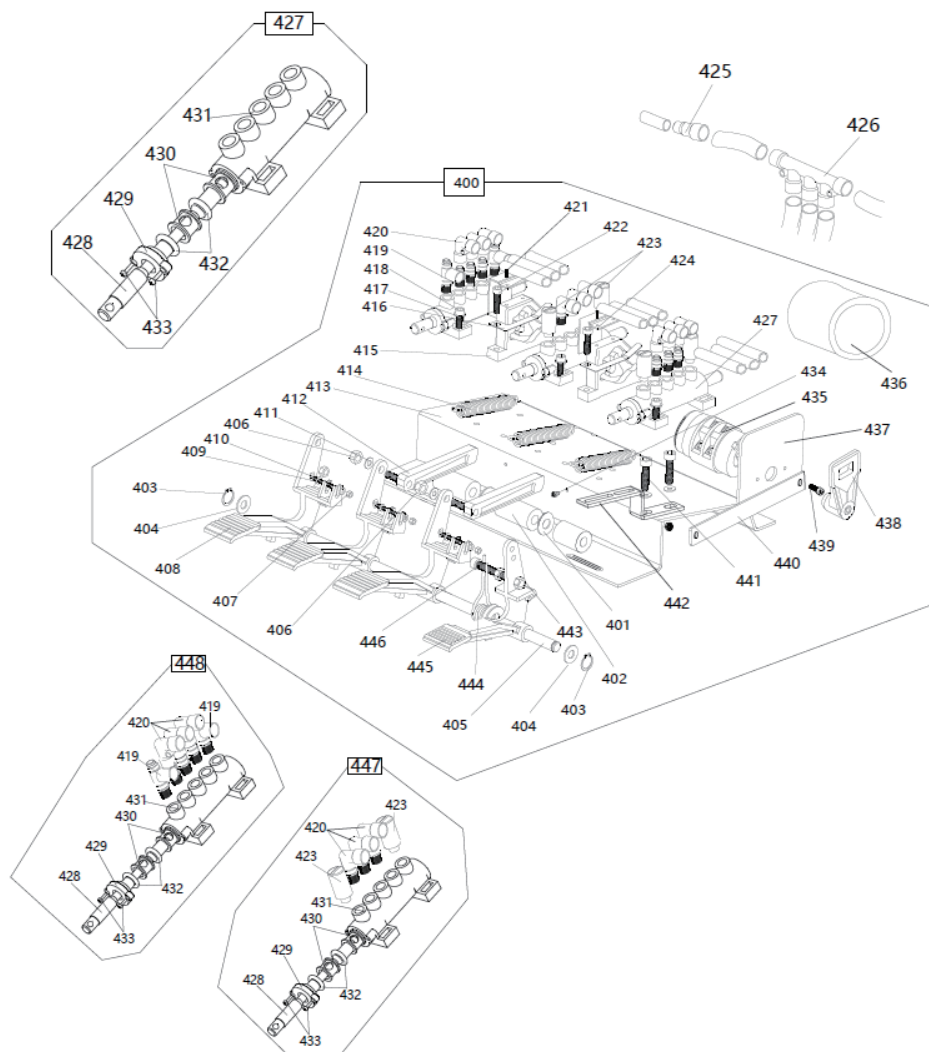
序号	配件物料号	名称	数量
700	PAE1024-31	大气缸 (总成)	1
701	PAE1024-32	大气缸缸筒 200	1
702	PAE1024-33	活塞 200	1
703	PAE1024-34	V 型密封圈	2
704	PAE1024-35	活塞导向环	1
705	PAE1024-36	O 型密封圈 $\phi 19 \times 2.65$	2
706	PAE1021-706	骨架防尘圈	1
707	PAE1021-707	密封圈 $\phi 19 \times 2.65$	1
708	PAE1021-708	$\phi 30$ 孔用卡簧	1
709	PAE1021-709	铜套 20*23*20	1
710	PAE1021-710	活塞杆	1
711	PAE1021-711	外六角螺母 M18*1.5*9mm	1
712	PAE1024-37	上缸盖	1
713	PAE1024-38	下缸盖	1
714	PAE1021-423	快插弯头 1/8- $\phi 8 \times 5$ (塑料, 黑)	2
715	PAE1021-715	外六角螺栓 M8*230mm	8
716	PAE1021-716	自锁螺母 M8	8
717	PAE1024-42	气管 $\phi 8 \times 900$ mm	2

## 6 电机部分:



序号	配件物料号	名称	数量
501	PAE1024-39	快拧三通 3*φ8*5( 金属 )	1
502	PAE1024-40	A 型平键 10*40	1
503	PAE1021-520	旋转配气阀总成	1
503.1	PAE1021-34B	弹簧管 UCφ8*5-5(3 圈)	1
503.2	PAE1024-12	配气阀芯	1
503.3	PAE1024-13	O 型密封圈 φ61.5*3.55	3
503.4	PAE1024-14	配气阀套 ( 赛钢 ) ( 车床 )	1
503.5	PAE1021-324C	快拧直通 1/8-φ8*5( 金属 )	3
503.6	PAE1024-15	气管 φ8*900	2
503.7	PAE1024-16	内六角凹端紧钉螺钉 M4*6	4
503.8	PAE1024-17	快拧三通 1/8-2*φ8*5	1
504	PAE1024-18	内六角凹端紧钉螺钉 M10*35	2
505	PAE1024-19	蜗轮箱总成 (318mm)	1
506	PAE2021-209	平垫圈 φ10*20*2	8
507	PAE1024-20	外六角螺栓 M8*30	4
508	PAE2021-208	弹性垫圈 φ10	6
509	PAE1021-110	平垫圈 φ8*24*2	6
510	PAE1021-716	自锁螺母 M8	4
511	PAE1024-21	通用电机支架	1
512	PAE1024-22	电机橡胶垫 φ10*20*2	6
513	PAE1024-23	电机 60HZ/110V/1.1KW	1
	PAE1024-24	电机 50HZ/220V/1.1KW	
	PAE1024-25	电机 50HZ/380V/0.75KW	
514	PAE1021-620	螺母 ( 白 )M10	6
515	PAE1024-26	外六角螺栓 M8*100( 全牙 )	2
516	PAE1021-114	平垫圈 φ8*17	2
517	PAE1024-27	防震胶垫	2
518	PAE1021-508A	内六角凹端紧钉螺钉 M8*12	1
519	PAE1024-28	电机皮带轮	1
520	PAE1024-29	多楔皮带 AV13*735( 带齿 )	1
521	PAE1021-508A	内六角凹端紧钉螺钉 M8*12	1

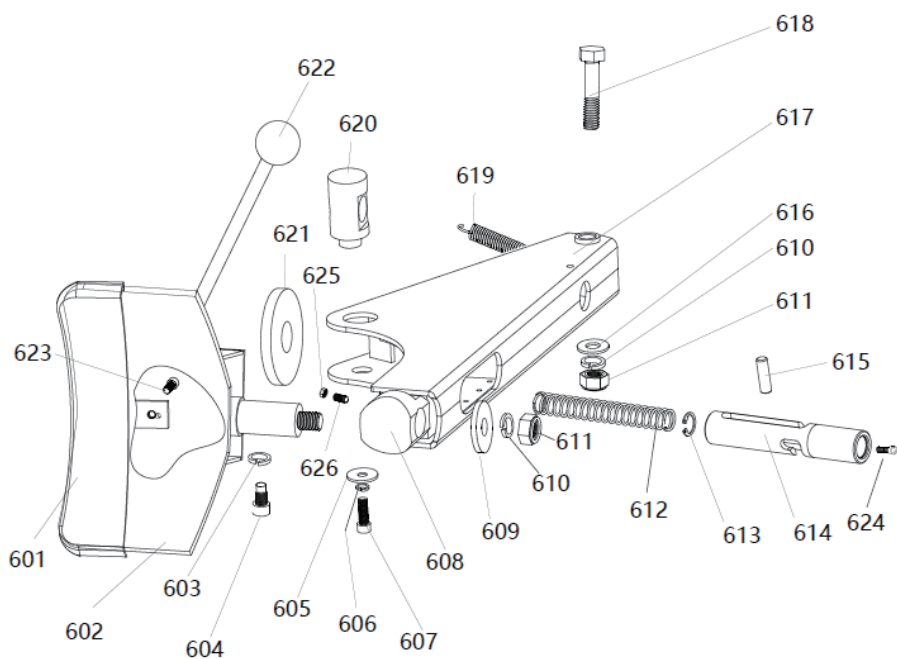
## 7 脚踏总成:



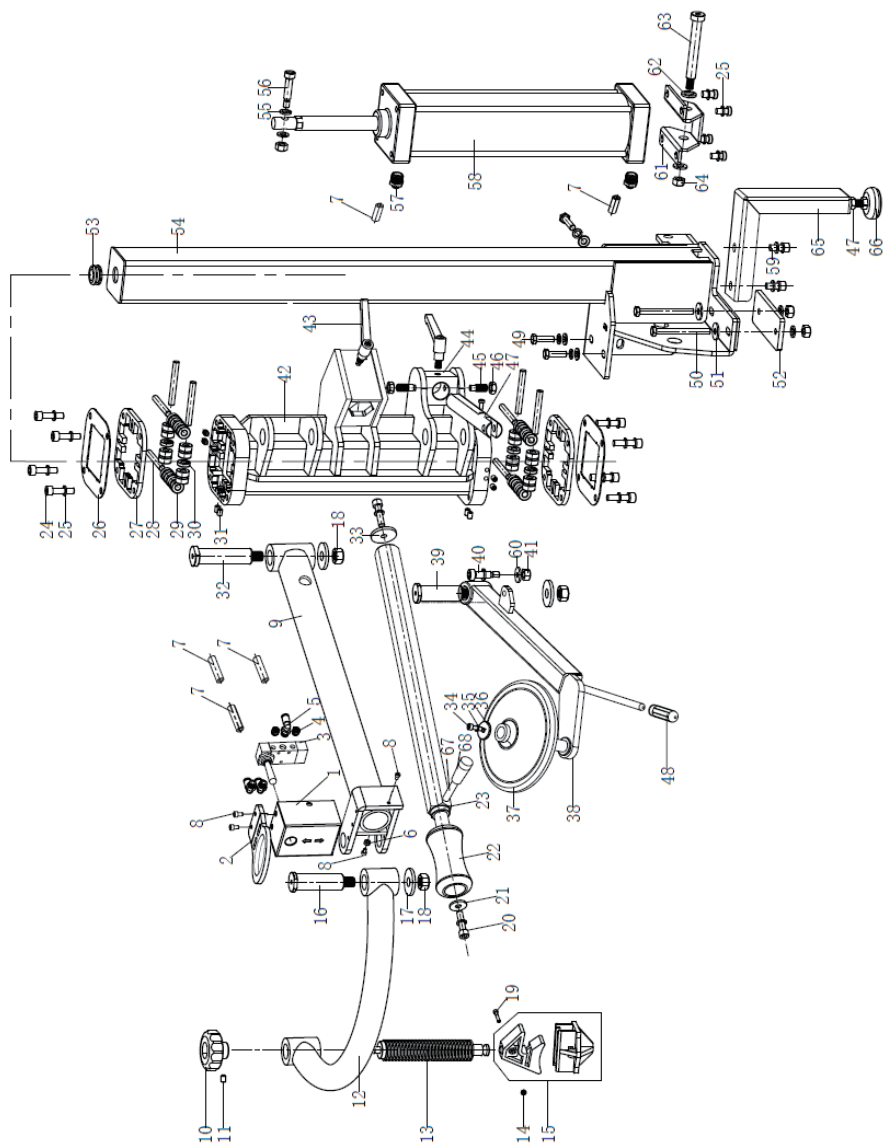
序号	配件物料号	名称	数量
400	PAE1022H-400	四脚踏组装总成	1
401	PAE1021-403	平垫圈 $\phi 12 \times 24 \times 1.5$	2
402	PAE1021-437	轴套 2 (镀锌)	1
403	PAE1021-322	卡簧 (轴用) $\phi 12$	2
404	PAE1021-316	平垫圈 $\phi 12 \times 24 \times 2$	9
405	PAE1021-404	(镀锌) 轴 $\phi 12 \times 282$	1



序号	配件物料号	名称	数量
406	PAE1021-716	自锁螺母 M8	2
407	PAE1021-438	自锁螺母 M4	3
408	PAE1021-407	大脚踏板	3
409	PAE1021-439	十字槽沉头螺钉 M4*35	3
410	PAE1021-440	平垫圈 φ4	3
411	PAE1021-114	平垫圈 φ8*17	2
412	PAE1021-413	凸轮连杆	2
413	PAE1022-413	脚踏支架组焊	1
414	PAE1021-435	脚踏拉簧	3
415	PAE1021-420	凸轮体	2
416	PAE1021-421	凸轮弹簧片	2
417	PAE2021-311	平垫圈 φ6*12*1.5	14
418	PAE1021-416	内六角圆头螺栓 M6*25	11
419	PAE1022-419	快插调节阀 1/8- Ø 6	2
420	PAE1021-423	快插弯头 1/8	9
421	PAE1021-418	十字槽半圆头自攻螺钉 3*10	4
422	PAE1021-416	内六角圆头螺栓 M6*25	4
423	PAE1021-422	消声器 1/8 (金属长式)	4
424	PAE1021-419	凸轮罩	2
425	PAE1022-425	快插直通 φ6 转 φ8( 塑料, 黑 )	1
426	PAE1022-426	快插五通 5*φ8( 塑料, 黑 )	1
427	PAE1022-427	五通阀体总成	3
428	PAE1022-428	五通阀杆 12mm( 外购 )	3
429	PAE1021-429	五通阀盖	3
430	PAE1021-430	五通阀隔套	15
431	PAE1021-431	五通阀体	3
432	PAE1021-432	O 型密封圈 12*20*4	18
433	PAE1021-418	十字槽半圆头自攻螺钉 3*10	6
434	PAE1022-434	内六角圆头螺栓 M5*10	1
435	PAE1021-425	转换开关 (3 节 /40A/ 单速 )	1
436	PAE1021-443	开关胶套 (3 节开关用 )	1
437	PAE1022-8	开关支架 1	1
438	PAE1024-09	倒顺开关手柄	1
439	PAE1021-108	内六角螺栓 M8*20	4
440	PAE1022-3	开关支架 2	1
441	PAE1021-24	内六角圆柱头螺栓 M6X16	2
442	PAE1022-18	扭簧限位支架	1
443	PAE2021-126	螺母 M8( 白 )	2
444	PAE1021-409	脚踏扭簧 φ3.5*20*70	1
445	PAE1021-410	大脚踏板 ( 开关专用 )	1
446	PAE1024-20	外六角螺栓 M8*30	1
447	PAE1024-10	五通阀总成 ( 全弯头 )	2
448	PAE1021-448	五通阀总成 ( 带调节阀 )	1

**8 铲臂总成:**


序号	配件物料号	名称	数量
601	PAE1023H-41	压胎铲护套	1
602	PAE1021-602	压胎铲	1
603	PAE1021-603	弹性垫圈 $\phi 14$	2
604	PAE1021-604	定位钉	2
605	PAE1021-605	平垫圈 $\phi 8^*30^*2$	1
606	PAE1021-113	弹性垫圈 $\phi 8$	1
607	PAE1021-108	外六角螺栓 M8*20	1
608	PAE1021-608	压胎铲转轴	1
609	PAE1021-131	工作台大垫圈	1
610	PAE1021-303	弹性垫圈 $\phi 16$	2
611	PAE1021-132	自锁螺母 M16	2
612	PAE1021-612	调节套压簧 $\phi 1.5^*19.5^*125$	1
613	PAE1021-613	孔用卡簧 $\phi 20$	1
614	PAE1021-614	大气缸活塞杆调节套	1
615	PAE1021-615	大气缸活塞杆销轴 $10^*33$	1
616	PAE1021-616	平垫圈 $\phi 16^*30^*2$	1
617	PAE1021-617	铲臂	1
618	PAE1021-618	外六角螺栓 M16*100	1
619	PAE1024-30	铲臂拉簧 $\phi 2.5^*20^*70$	1
620	PAE1024-41	大气缸拉杆套	1
621	PAE1021-621	铲臂胶垫 (薄)	1
622	PAE1021-622	黑球手柄 M16*50	1
623	PAE1021-24	内六角圆柱头螺栓 M6*10	1
624	PAE2021-405	内六角圆柱头螺栓 M6*16	1
625	PAE1021-625	螺母 M10 (薄)	1
626	PAE1021-626	内六角凹端紧定螺钉 M10*20	1

**9 辅助臂:**


序号	配件物料号	名称	数量	序号	配件物料号	名称	数量
1	PAE1022-H1	手推阀护盒	1	35	PAE1021-113	弹性垫圈 φ8	1
2	PAE1022-H2	把手	1	36	PAE1022-H36	加大平垫圈 8	1
3	PAE1022-H3	手推阀	1	37	PAE1022-H37	托胎盘 (塑料)	1
4	PAE1021-422	消声器 1/8(金属长式)	2	38	PAE1022-H38	右托胎臂	1
5	PAE1022-221	快插弯头 1/8-φ6(金属)	3	39	PAE1022-H39	托臂销	1
6	PAE2021-121	螺母 M6	1	40	PAE1022-H40	塞打螺丝 M12*30	1
7	PAE1022-H7	气管 6×3500mm	3	41	PAE1022-208	自锁螺母 M10	3
8	PAE1021-24	内六角圆柱头螺栓 M6*10	5	42	PAE1025-24	升降滑套	1
9	PAE1022-H9	右横臂	1	43	PAE1022-H43	7字型锁紧手柄	2
10	PAE1022-H10	梅花手柄 12*80(孔)	1	44	PAE1022-H44	转动块	1
11	PAE1022-H11	内六角凹端紧钉螺钉 6*6	1	45	PAE1022-H45	锁紧板定位钉	2
12	PAE1022-H12	弯臂	1	46	PAE1021-107	螺母 M12(薄)	3
13	PAE1022-H13	双线丝杆	1	47	PAE1022-H47	托胎锁紧杆	1
14	PAE1022-H14	自锁螺母 M6	1	48	PAE1022-H48	铲臂手柄套	1
15	PAE1022-H15	压胎头	1	49	PAE1022-H49	外六角螺栓 M10*40	4
16	PAE1022-H16	横臂销二	1	50	PAE1022-H50	外六角螺栓 M10*120	2
17	PAE1021-131	工作台大垫圈	3	51	PAE2021-212	加厚平垫圈 10*25*4	8
18	PAE1021-132	自锁螺母 M16	3	52	PAE1022-H52	立柱固定夹板	1
19	PAE2021-313	内六角圆柱头螺栓 M6*35	1	53	PAE1022-H53	护线圈 φ28-5	3
20	PAE1021-127	外六角螺栓 M10*25	2	54	PAE1025-25	立柱组件	1
21	PAE2021-108	平垫圈 φ10*30*2	1	55	PAE1021-317	弹性垫圈 φ12	1
22	PAE1022-H22	压胎辊 (4) (金华)	1	56	PAE1022-H56	塞打螺丝 M12*40	1
23	PAE1025-23	六角压杆轴	1	57	PAE1022-H57	快插直通1/2-φ6(塑料,黑)	2
24	PAE1022-27	外六角螺栓 M10*30	8	58	PAE1022-H58	标准气缸 (不带座) φ100x350	1
25	PAE2021-208	弹性垫圈 φ10	16	59	PAE1021-127	外六角螺栓 M10*25	2
26	PAE1022-H26	滚轮盖板	2	60	PAE2021-209	平垫圈 φ10*20*2	1
27	PAE1022-H27	滚轮夹板	2	61	PAE1022-H61	气缸底座	1
28	PAE1022-216	轴承钢圆柱销 M10*80	8	62	PAE1021-303	弹性垫圈 φ16	1
29	PAE1022-H29	滚针轴承带内圈 NA6900	16	63	PAE1022-H63	塞打螺丝 M16*110	1
30	PAE1022-218	深沟球轴承 6900z	8	64	PAE1022-202	自锁螺母 M12	1
31	PAE1021-508A	内六角凹端紧钉螺钉 8*12	8	65	PAE1022-H65	支撑杆	1
32	PAE1022-H32	横臂销一	1	66	PAE1022-H66	带橡胶减震脚杯垫脚	1
33	PAE1022-206	(镀锌)锁紧垫片	1	67	PAE1025-09	双头丝杆 M10*80	1
34	PAE1021-308	内六角圆柱头螺栓 M8*20	1	68	PAE1025-10	胶木长手柄套 M10*50 黑	1



Technical parameters	External rim diameter	Inner rim diameter	Rim width	Max wheel diameter	Big cylinder push-pull force
AE1025H	11-24"	13-26"	350mm	1080mm	2500 kgf
AE1025H-3					
Technical parameters	Big disk speed	Work pressure	Work noise	Outer box size	Gross/net weight
AE1025H	6.5 rpm	8-10 bar	≤ 70 dB	1150*950*1020mm	288/263 Kg
				1150*520*300mm	88/75 Kg
AE1025H-3				1150*950*1020mm	288/263 Kg
				1150*520*300mm	88/75 Kg

Check the product immediately after unpacking to ensure that the product is in good condition. If any parts are missing or damaged, please contact the Customer Service Department of SATA Automotive Technology (Shanghai) Co., Ltd by phone:400-820-3885, 800-820-3885.

Please record the product serial number:

Note: If the product does not have a serial number, record the date of purchase.

Please keep the instruction properly:

- 1) The instruction contains information on safety warnings, installation, maintenance, and troubleshooting of the product. Keep it properly.
- 2) Please record the serial number (or purchase date) of this product on the front page of the instruction, and keep it in a dry and safe place for reference.
- 3) Please fully understand the contents of the instruction for correctly using the product.
- 4) This product has been insured with product liability insurance.



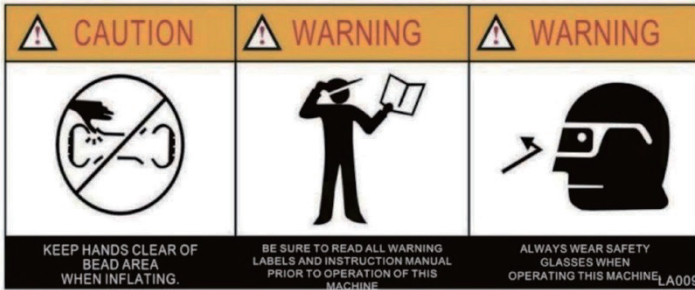
## Chapter I      Safety precautions

- Improper operations can result in personal injury and equipment damage.
- Please read and understand the instructions carefully before use.
- Keep children and other unauthorized personnel away from the work area.
- Ensure that the equipment is connected to the correct power supply and air source and is reliably grounded.
- Please use the device on a flat, level, dry and reliable bearing surface.
- To avoid accidental startup, ensure that the equipment is shut down and the power supply is disconnected before maintenance.
- Keep the guards and safety devices in the correct position and in working order.
- Keep the work area clean and well lit. Messy or dark areas can cause accidents
- Avoid overload. Otherwise, the accident liability is not covered by the insurance.
- Keep the device away from heat and fire sources. High temperature may cause damage to the device and sealed components.
- Avoid hazardous environments and do not use equipment in wet environments or expose it to rain.
- No untrained personnel is allowed to use the equipment, and it is not allowed to disassemble or modify the equipment without permission.
- Install the wheels correctly, and fasten them to the equipment in a proper way according to different hubs.
- Check carefully before use each time, and do not use it if there is oil leakage, and loose or damaged parts or accessories.
- Let professional personnel with professional maintenance qualification maintain the equipment reasonably. If parts need to be replaced, please use the original parts.
- When operating, wear safety shoes, protective glasses and work gloves in accordance with the relevant national safety protection regulations. Relevant SATA products are recommended.
- It is strictly prohibited to use the device in such circumstances as after drinking, lack of energy and concentration, drowsiness under the influence of drugs or unconsciousness.

### Warning

**The cautions, warnings, instructions, etc. contained in the instruction do not cover all possible situations. Operators must understand that daily care and professional knowledge are indispensable factors in the operation of this product.**

## 1.1 Warning label



Keep your hands away from the tires during operation

Wear protective equipment when operating

Read the instruction carefully before use



Danger of electric shock!



Note: Do not touch the sidewall of the tire with your hands when pressing the tire



Do not put any part of the body under the disassembling and assembling head



When clamping the rim, keep your hands and other parts away from the area between the pawl and the rim



When pressing the tire, do not stand between the shovel blade and the tire to avoid injury

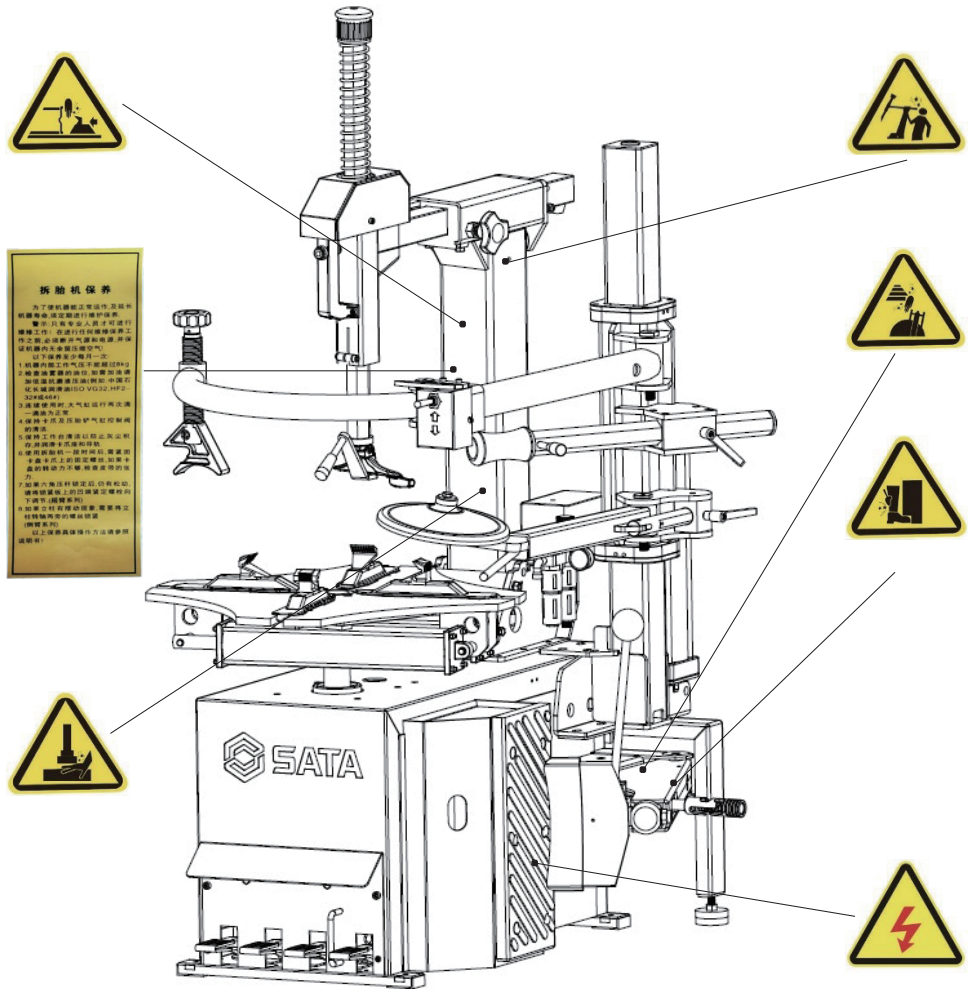


Avoid injury due to bending backward of column



### 1.2 Diagram of safety mark location

Keep the safety mark intact, and replace it immediately if blurred or missing. Keep the safety mark clearly visible to the operator with meaning clearly indicated

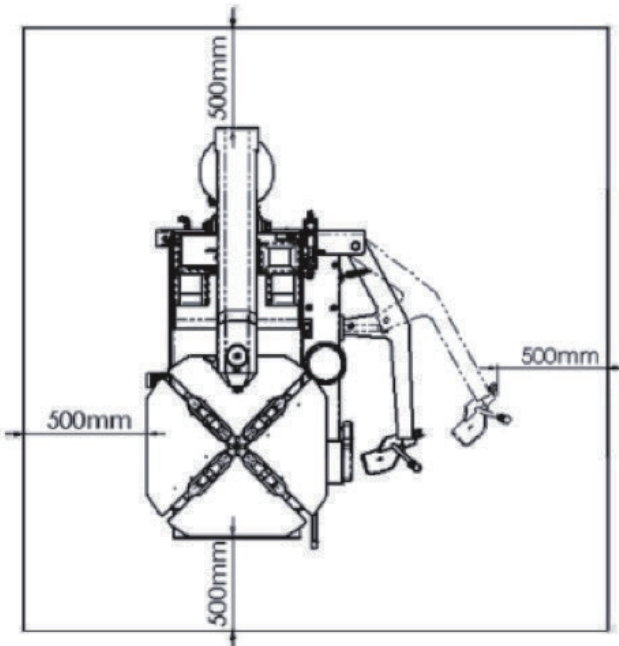


## Chapter II Installation instructions

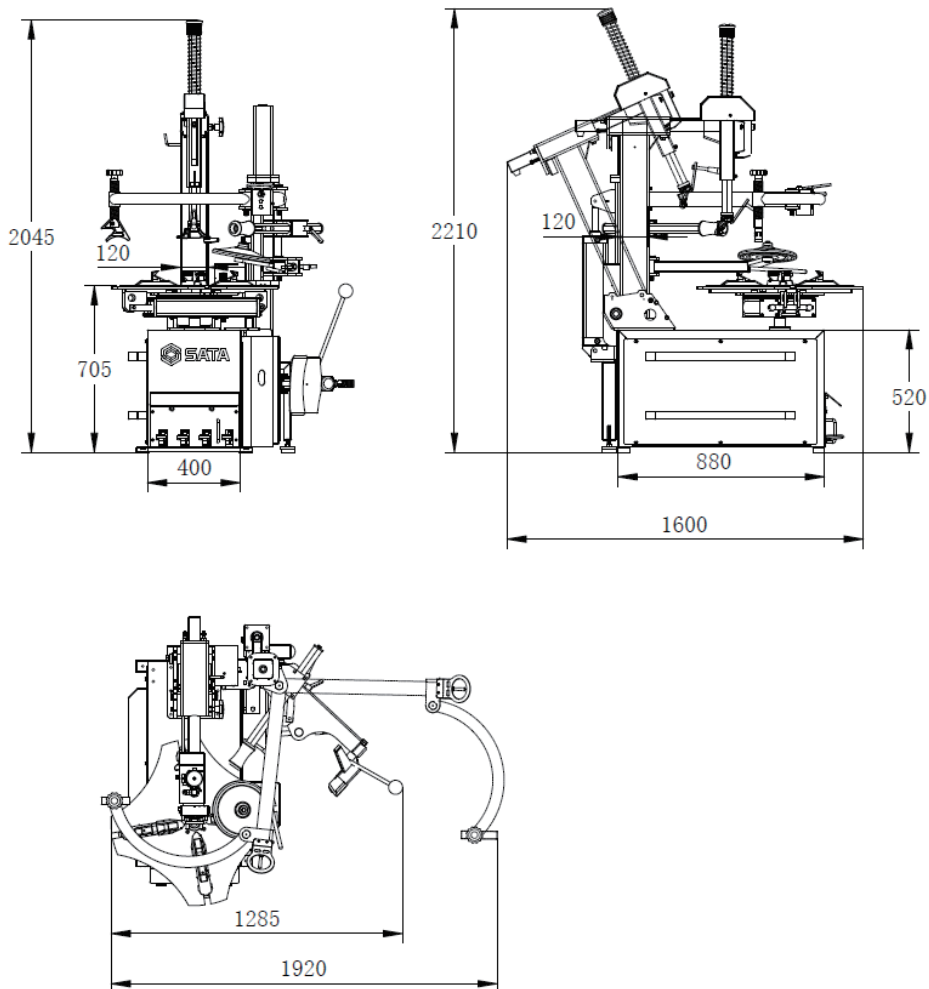
The installation of the tire changer must be done by professional personnel. Safe and effective use depends on proper installation. If you have any questions, please contact an authorized SATA distributor.

### 2.1 Device size and usage space

- The tire changer must be placed on a solid flat floor and bolted in place.
- The location where the tire changer is installed must have power supply and air source nearby, connected together.
- Adequate operating space shall be left around the tire remover at the place suitable for installing the tire remover.
- Make sure there is enough space above and behind the selected position for the auxiliary or inverted arm to work properly
- At least 500mm operation space should be left on the right side and front side of the tire changer for tire removal and installation, as well as pressing.



## AE1025H/AE1025H-3 Dimensional drawing

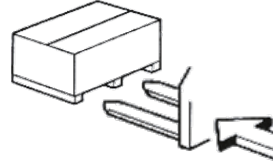


## 2.2 Safety rules

- The equipment should be operated by professional or trained personnel.
- The company is not responsible for any unauthorized operation of the equipment (especially the electrical part).
- Any handling of the electrical part should only be done by professional personnel.

## 2.3 Transportation/unpacking

- Use forklift to move, with the lifting position shown in the figure on the right.
- Remove the package and check the equipment for damage.
- Keep packing materials away from children to avoid danger.

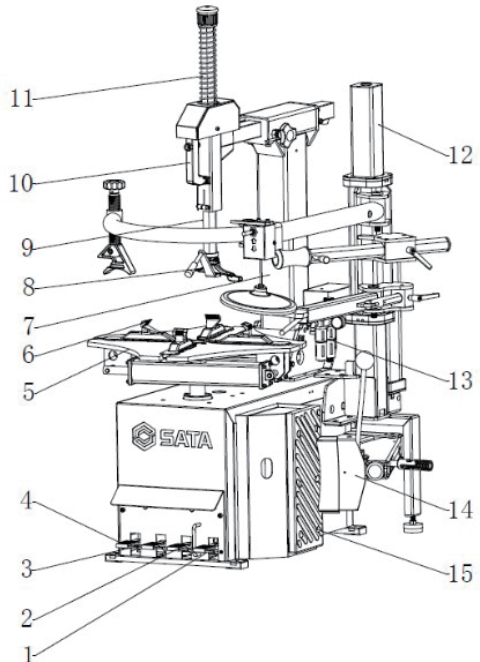


## Note

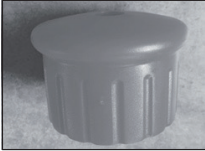
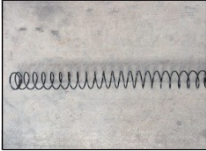




The surface of the equipment is coated with a layer of special antirust oil, which is easy to catch dust, and should be removed as far as possible when necessary.

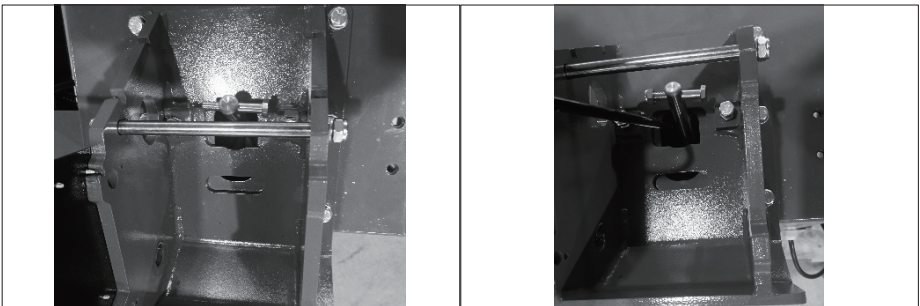
## 2.4 Product diagram

1. Rotation pedal
2. Tire pressing pedal
3. Clamping pedal
4. Inverted arm pedal
5. Workbench
6. Pawl
7. Column
8. Disassembling and assembling head
9. Slide arm
10. Control handle
11. Hexagon pressing bar
12. Auxiliary arm assembly
13. Lubricator
14. Tire pressing shovel arm
15. Tire rubber pad

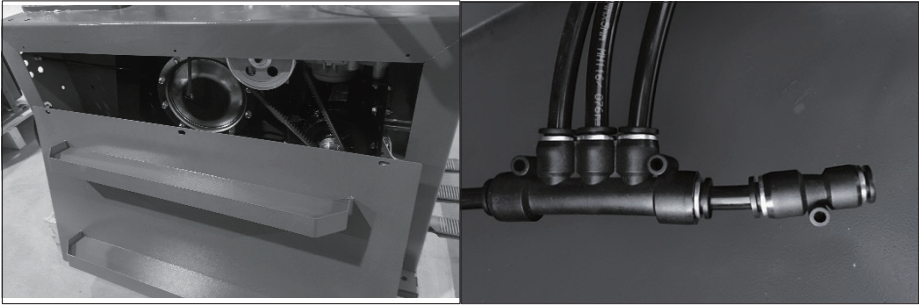


**2.5 Standard fittings:**

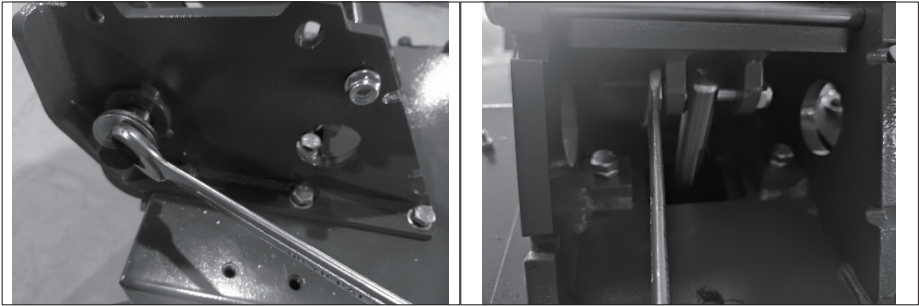
			
Inflation meter	Hexagon rod compression spring cap	Hexagon rod compression spring	20-inch crowbar
			
Disassembling and assembling head pad - front/rear	Crowbar sheath	Column hook	Instructions

**2.6 Column installation**


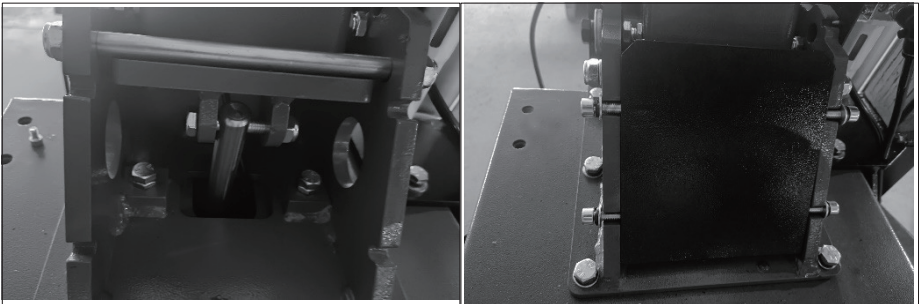
- a. Remove the column rotating shaft on the rear tilt arm seat for installation later
- b. Pass the air pipe on the column through the square slot on the rear tilt arm seat



- c. Remove the four screws on the left side panel of the chassis and remove the left side panel
- d. Connect the air pipe on the column to the "8-to-6" connector and reinstall the side plate



- e. Insert the column rotating shaft into the column and secure with studs and washers
- f. Connect the cylinder rod with a bolt to the column



- g. Adjust the positioning screws on both sides of the column
- h. Install protective cover for column

## 2.7 Power connection

- Before powering on the device, check whether the grid voltage is consistent with the voltage specified on the device label.
- Very important: When the equipment is connected to an electrical system, the electrical system should be equipped with line fuse. Good grounding must comply with local national standards, and leakage protection devices should be equipped for the equipment when necessary to ensure safe operation.

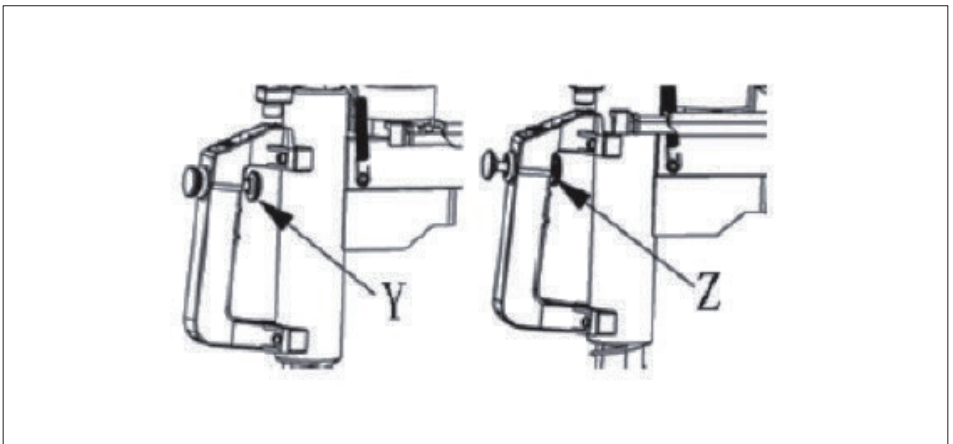
## 2.8 Air supply connection

- 1) Press the clamping pedal down to make sure the pawl does not open suddenly.
- 2) Connect the air source to the oil-water separator with a quick connector. Adjust the pressure gauge to show the air pressure.
- 3) Connect the inflation meter to the air source by pipeline, and press the handle to confirm that the inflation function is normal.

## 2.9 Equipment test

- 1) Step on the rotary pedal, and the big disk turns clockwise. Release on the rotary pedal, and the big disk turns counterclockwise.
- 2) Step on the clamping pedal, and the pawls of the four big disk open; step on the clamping pedal again, and the pawls close.
- 3) Step on the clamping pedal, the tire clamping shovel works; step on it again, and the tire clamping shovel returns to the original position.
- 4) Step on the inverted arm pedal, and the column U leans back; step on the pedal again, and the column returns to the working position.
- 5) Press the handle button (position Y), the tire dismantling arm and push-pull arm will be locked; release the handle button (position Z) to unlock.
- 6) Check whether the oil of the oil-water separator drops 1 drop after every 3-4 times of stepping. If no, adjust with screw.

**Note: For 380V equipment, if the rotation direction of the big disk is different from the above direction, replace the two phase lines on the 3-phase terminal post**



## Chapter III Operation Instruction

Collect device operation data via WIFI.

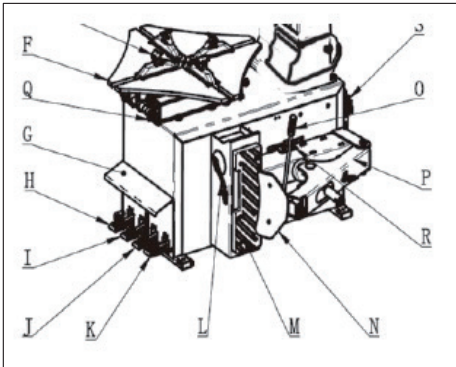
View the operation data from the background (login through WEB using user account and password; please contact SATA for user account and password)

3.1 Use the machine only after reading and understanding the instructions and warnings provided. Deflate the tire and remove all lead blocks from the wheel before proceeding. The operation of a tire changer consists of the following steps: a) Clamping tire, b) Removing the tire, and c) Assembling the tire

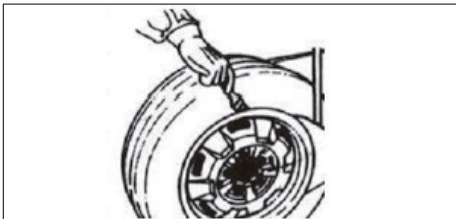
3.2 It is suggested that the tire changer should be equipped with pressure regulating device.

### 3.3 Clamping tire

- Pay high attention when clamping the tire. When the tire clamping arm driven by the tire clamping pedal moves fast and powerfully, the tire clamping arm can cause danger and crush everything in the area where it moves.
- Check if the tire is deflated. If not, deflate it. Close the big disk pawl thoroughly.
- It can be extremely dangerous to the operator's hands if the pawl opens when clamping the tire. Do not touch the tire wall with hands when clamping the tire.



Put the wheel against the tire clamping rubber on the right side of the tire changer box. Place the tire clamping shovel on the seam about 1cm from the rim. Press the tire shove against the tire rather than the rim.



Step on the pedal and move the tire clamping shovel. When the tire clamping shovel reaches the end of its journey or gets into the seam, release the pedal and gently rotate the tire till it is completely removed from the rim.



### 3.4 Removing tire

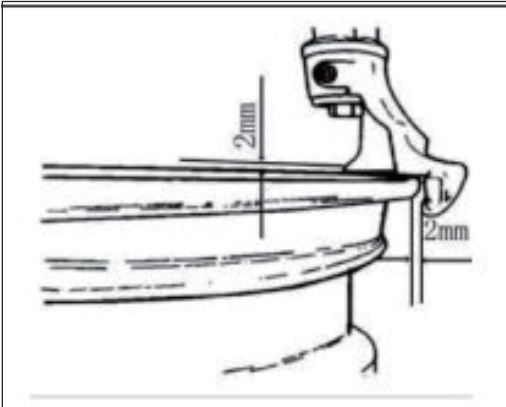
- Make sure all lead blocks are removed before operation and check for tire deflation
- When the column is tilted back, make sure no one is behind the tire changer
- Step the pedal to tilt the column, so as to clean the big disk
- Apply grease (or similar product) to the seam to avoid serious damage to the seam.
- Never place your hands under the tire while locking the rim. The correct fixation operation is to make the tire in the center of the big disk.

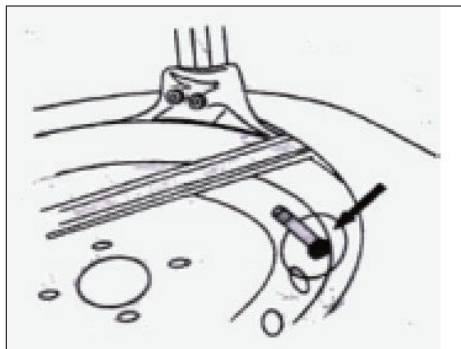
### 3.5 External clamp

Place the tire according to the position of the pawl on the big disk, step on the pedal to the middle position, place the tire on top of the pawl and press the rim down, and then step on the pedal to the limit position (Fig. 5-1 I).

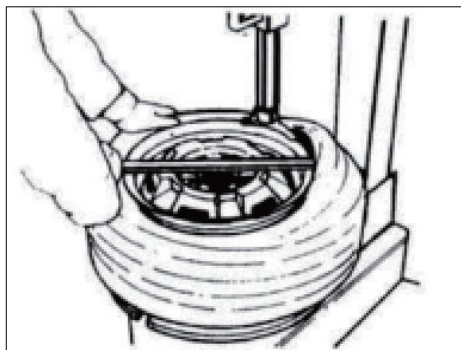
### 3.6 Internal clamp

- Position the tire according to the pawl position to make it completely closed; place the tire over the pawl and press down the rim, and then step on the pedal to open the pawl to grip the rim.
- Make sure the rim is firmly attached to the pawl
- Never put your hands on the wheel. Returning the column to the working position can cause a crush injury to the operator's hand, making it sandwiched between the tire and the rim.
- Step on the pedal to flip the column so that the lock button is in the locking position, unlock the tire change arm M, and move the tire change arm down so that the bird head is on the upper part of the rim. Set the lock press button in the locking position to lock the entire tire change assembly. This lock is done horizontally and vertically with the tire change head 2mm from the rim. Place the crowbar between the seam and the bird head so that the seam moves above the bird head.
- To avoid damaging the inner tube, position the valve 10cm to the right of the tire change head.
- Necklaces, bracelets, loose clothing or and foreign objects near moving parts can endanger the operator.

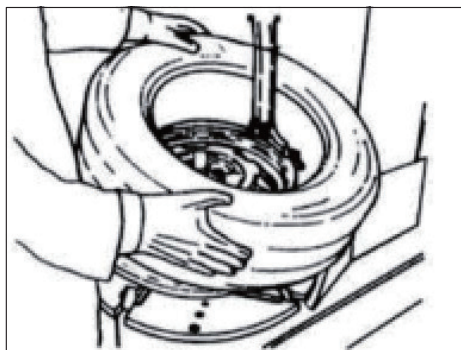




Pry the bead onto the raised part of the disassembling and assembling head with a crowbar, and step on the turntable turning pedal intermittently (Figure 5-1 K) to let the turntable rotate clockwise until the upper bead is removed completely. Keep the valve about 10cm away from the right side of the tire change head to avoid damage to the inner tube;



To remove the inner tube, step on the pedal to tilt the column, without unlocking the tire change arm; Repeat the operation to open the seam on the other side.



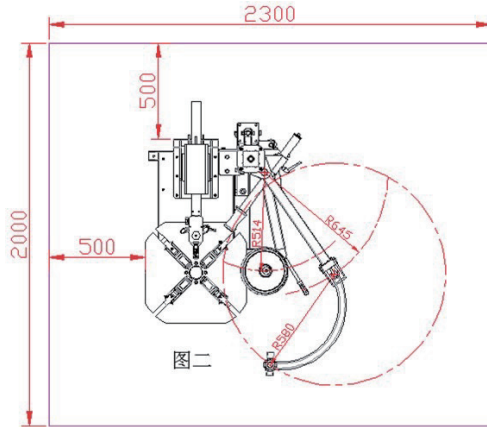


### 3.7 Installing tire

- The most important thing is to check the tires and rims to prevent explosions during re-inflation. Before installation, make sure that: The tire and tread fibers were not damaged. Otherwise, do not install the tires; The rim is free of dents and warps; visually check to confirm that there are no tiny scratches on the inside of the aluminum rim, which are dangerous, especially when inflated.
- Use special grease for seam lubrication so as to avoid damage to seam and facilitate operation; Do not place your hands under the tire while locking the rim. The correct operation is to position the tire in the center of the big disk. Make sure no one is standing behind the column as it tilts.
- If the rims are of the same size, it is not necessary to lock or unlock the tire change arm frequently. All you need to do is to tilt the column back or restore it to the working position, keeping the tire change arm in the working position.
- Never put your hands on the wheel. Returning the column to the working position can cause a crush injury to the operator's hand, making it sandwiched between the tire and the rim.
- Move the tire so that the bead passes under the front of the bird head, with the raised part of the bead against the back of the bird head, and push the bead into the slot of the rim by hand. Step on the pedal to make the big disk rotate clockwise. Continue this operation until the tire is fully mounted on the rim.
- To prevent industrial accidents, keep hands and other body parts as far away from the tire change arm as possible while the big disk is turning; put in the inner tube and repeat the above operations.
- When disassembling and assembling the tire, the big disk should turn clockwise. The counterclockwise rotation is only used for error correction when the machine stalls and the operator makes a mistake.

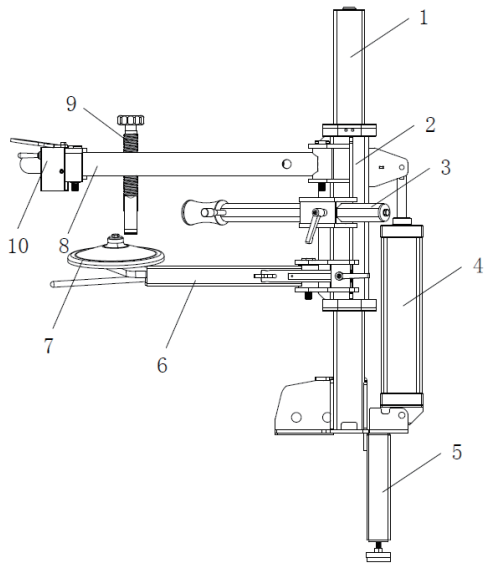
## Chapter IV Installation and operation of auxiliary arm

### 4.1 Auxiliary arm dimensions and operation space

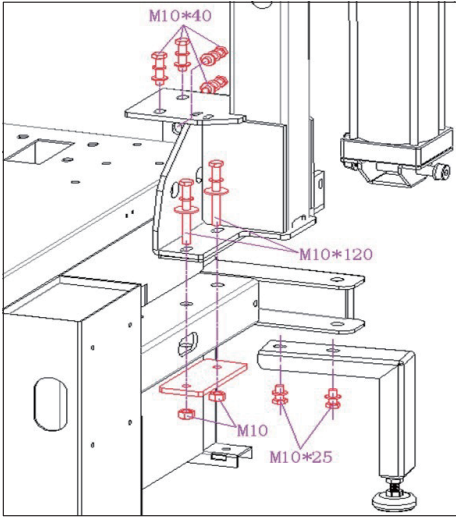


### 4.2 Components

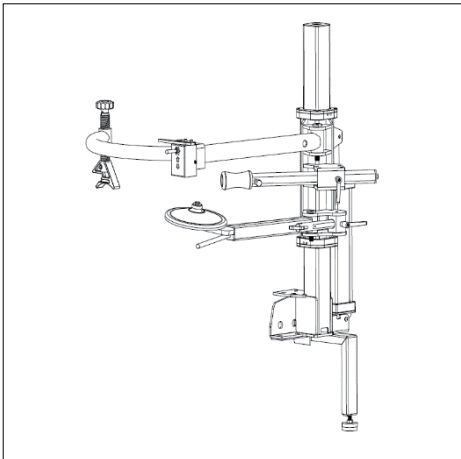
1. Column
2. Lifting slide
3. Roller slide bar (fixing tire pressure arm)
4. Lifting cylinder
5. Supporting leg
6. Tire supporting arm
7. Tire supporting plate
8. Round cross arm (rotary tire pressing cross arm)
9. Tire pressing screw rod
10. Control valve



### 4.3 Installation



- 1) Fix the auxiliary arm to the corresponding hole position of the chassis with 4 external hexagonal cylindrical-head bolts M10\*40, 2 external hexagonal cylindrical-head bolts M10\*120 and 2 M10 self-locking nuts, and connect the supporting leg to the column guide rail with an external hexagonal cylindrical-head bolt M10\*25.



- 2) Install the rotary pressing arm, fixed tire pressing arm and tire supporting arm on the sliding sleeve assembly, and then insert the corresponding air pipe.

### 4.4 Operating instructions

The control handle is used to control the rise and fall of the tire pressing block and tire pressing wheel to meet the height for mounting and removing tires.



#### 4.5 Tire pressing shovel Installation



1. Take out the tire pressing shovel, remove the gasket and locking nut on the shaft of the tire pressing shovel.
2. Insert the tire pressing shovel shaft into the shovel arm rotary shaft.
3. Install spacer and locking nut, and tighten them with wrench.

## Chapter V Storage

If the equipment is to be stored for a long time, disconnect the power supply and air source. Lubricate all parts to be lubricated: sliders, slider slots on the big disk, and position for mounting auxiliary arm. Drain all oil/liquid storage. Cover the equipment with a plastic cover to prevent dust.

## Chapter VI Scrapping

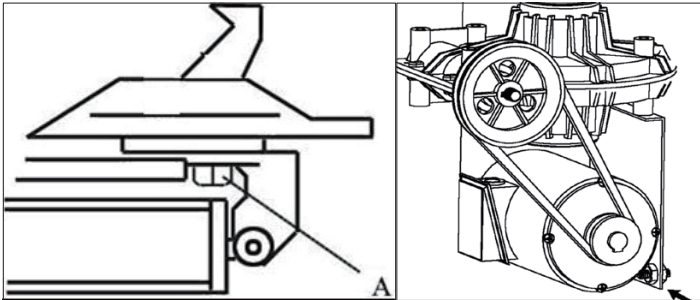
When the device expires and cannot be used any more, handle it properly according to local laws and regulations.



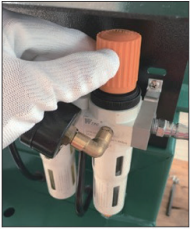
## Chapter VII Daily Maintenance

To prolong the service life of the machine, regular maintenance should be carried out according to the instructions. Otherwise, the operation reliability of the machine will be affected, which may cause injury to the operator and people near the machine. Caution: Before maintenance at any time, it is necessary to disconnect the air source and power supply and step on the pedal 3-4 times to exhaust the remaining compressed air in the machine. The damaged parts must be replaced by professional maintenance personnel with the original spare parts provided by the factory.

- 1) Keep pawls and cylinder control valve of tire pressing shovel clean.
- 2) After using the machine for 20 days, re-tighten the fixing screw (A) on the chuck pawl.
- 3) If the turning power of the pawl disk is not enough, check the tension of the belt as follows. Loosen the screws on the left side plate of the body, remove the side plate, adjust the two adjusting screws for installing the motor, so that the distance between the adjusting bracket and the motor seat is appropriate, and then tighten the screws to tension the drive belt.
- 4) To open/close the large cylinder of pawl and tire pressing shovel reliably, the control valve connected with it should be kept clean, which can be maintained according to the following instructions. Remove the 4 screws on the left panel of the body and remove the side panel; Release the open/close pawl or valve body muffler on large cylinder control pedal.
- 5) Clean the dirt on the muffler with compressed air. If damaged, replace it according to the spare parts list.



- 6) The pressure is not more than 10 Ba.
- 7) Keep workbench clean to prevent dust accumulation, and lubricate pawl seat and rail.
- 8) If the swing arm is not locked or does not reach the required size, the swing arm locking plate needs to be adjusted.
- 9) If the column swings, it is necessary to lock the screws on both sides of the column rotating shaft.
- 10) Check the oil level of the oil cylinder of the oil atomizer. If refueling is required, loosen the screw with a hex wrench or unscrew the cylinder counterclockwise for refueling. Only VG32 lubricating oil can be added. If compressed air is connected, step on the pedal for the first time to see whether the oil atomizer drops the first drop of oil; When used continuously, step on the pedal to see whether the oil atomizer drops a drop of oil.



Pull out the cover and rotate it to adjust the pressure in a range of 8-10bar



Press the lid down to lock the pressure



Check the water level height of the steam-water separator regularly, which cannot exceed 50% of the height of the separator; turn the locking button to manually drain water if necessary.



Check the lubricating oil level daily, and open the oil cap to add oil when necessary. Note that it is forbidden to use lubricating oil that has been exposed to air for a long time.



Check the lubrication condition daily to ensure that the lubricant drops into the oil atomizer when the pedal is stepped on. Use a screwdriver to adjust the oil atomizer adjusting screw if necessary.





## Chapter VIII Troubleshooting

### 8.1 Working disk does not move

Maintenance clue: Check whether it is an electrical fault or a mechanical fault.

Maintenance method:

- Step on or lift the reverse switch pedal and observe the motor reaction. If there is no reaction, use a multimeter to measure the reverse switch, and whether the voltage between the terminals is normal; If it is not normal, check the power supply line or power plug; If the voltage is normal, use a multimeter to measure whether the voltage of between terminals of the reverse switch is normal when stepping on and releasing the power switch pedal; If it is not normal, the reverse switch fails; If it is normal, the motor or capacitor fails.
- If the motor has a humming sound, but cannot turn, follow the same measurement method mentioned above. If the measurement result is abnormal, the reverse switch fails. If normal, turn the gearbox belt wheel by hand; If you can't turn it by hand, the gearbox fails. If you can rotate it by hand, the motor or capacitor fails.
- If the motor can rotate normally and the working disk does not rotate, it should be a gearbox failure, for example: Gearbox pulley does not drive the worm to rotate: Worm gear outburst.

### 8.2 Poor tire removing force

Maintenance method: observe the working condition of the motor when removing the tire. If the motor cannot rotate when removing the tire, the motor torque is too small or the capacitor is faulty. If the motor can run, but the pulley is slipping, it means the belt is too loose; just tighten the belt.

### 8.3 Pawls can't clamp the steel rim firmly

Maintenance method: check whether the supply air pressure meets the requirements of the instructions. If yes, check for air leakage or blow-by. If no, the concentric height of the pawl is improper.

### 8.4 The large cylinder cannot press the tire

Maintenance ideas: if the tire pressure is weak (including such situations as the large cylinder can run when no load, the tire cannot be pressed properly), the possible causes can be low pressure, leakage, or large cylinder blow-by. If the large cylinder cannot run without load, the possible reason is that the compressed air is not added to the tire pressing end of the large cylinder.

- Check whether the supply air pressure meets the requirements of the instructions. If yes, check whether the large cylinder leaks, check the air pipes controlling both ends of the large cylinder, and connect to the air source. In this case, air should be coming out of one of the two pipes on the five-way valve, and air should come out of the other air pipe when the tire pressing pedal is depressed. If no, the five-way valve should be replaced or its installation position should be adjusted to make it work normally.
- If the five-way valve is normal, connect the air pipe at the reset end. It is normal that there is no air coming out on the nipple of the tire pressing end. If yes, it indicates that the large cylinder piston is cracked or the seal ring is worn.
- Check the air pressure: Use a barometer to check whether the air pressure at the inlet of the oil atomizer meets the requirements of the instructions. If the air pressure at the inlet is not enough, increase the air supply of the air compressor. If the air pressure at the inlet meets the requirements and the air pressure at the outlet is not enough, adjust the pressure regulating knob of the oil atomizer. If the regulating knob does not work, replace the oil atomizer.

### 8.5 Tire disassembling and assembling head scraps the steel rim or bits the tire:

- Hexagonal column pin lock is not tight
  - The screws on the disassembling and assembling head are loose or in the wrong direction
  - The gap between the hexagonal column and the hexagonal sleeve is large
- Maintenance method:
- Adjustment of loose screws in the disassembling and assembling head: pre-tighten (not too tight) the screws in



advance, and then tighten them. When installing the screws, install a medium-size tire, let the wheel of the tire removing head lean against the steel rim, turn the direction of the tire removing head to match the arc of the steel rim, and then tighten and fix it.

- If the hexagonal column swings too much, change the rocker.

### 8.6 Pawls cannot open or close:

Check whether there is leakage, or the five-way valve element runs out of the pedal shifting fork. If the above is normal, check whether the rotatory distributing valve is subject to blow-by. Remove the pipe connecting the rotary distributing valve to the small cylinder. If only one of the pipes connecting the rotary distributing valve to the small cylinder has air coming out when the pedal is not pressed down or completely pressed down, or the two air pipes do not emit air at the same time, the rotary distributing valve is subject to blow-by. If all the above parts are OK, check the clamping part: whether the pawl seat is deformed or stuck, whether the square turntable is stuck, or whether the square turntable pin falls off.

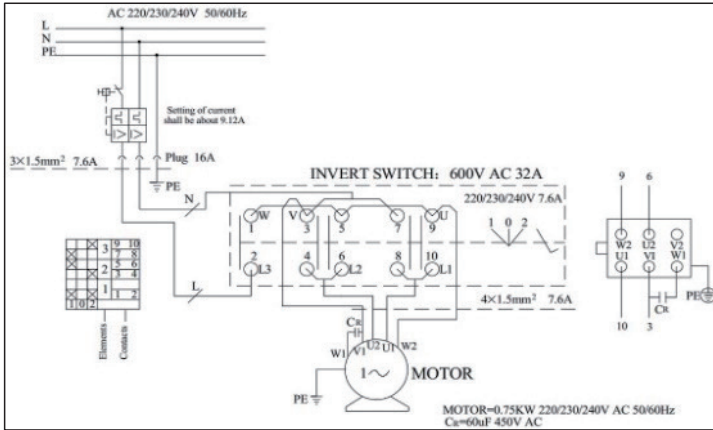
### 8.7 Common troubleshooting

Failures	Causes	Solutions
Tire disassembling and assembling head scraps the steel rim or bits the tire	The column loosens, leading to displacement of the disassembling and assembling head	Tighten the column
	The swing arm/slide arm loosens, leading to displacement of the disassembling and assembling head	Adjust the gap between the swing arm/slide arm
	The clearance of the hexagonal rod is large, leading to displacement of the disassembling and assembling head	Adjust the clearance of the hexagonal rod
	The disassembling and assembling head is loose	Tighten the disassembling and assembling head
	The plastic gasket of the disassembling and assembling head falls off	Install the plastic gasket
	Clearance between the disassembling and assembling head and rim is too small	Adjust the clearance between the disassembling and assembling head and rim by 2-4mm
Pawls don't hold the rim tightly	Leakage/blow-by of clamping cylinder	Check the air pipe connector/replace the sealing ring
	Leakage/blow-by of rotary distributing valve	Check the air pipe connector/replace the sealing ring
	Improper position/leakage/blow-by of five-way valve	Adjust the position of the five-way valve/replace the O-ring
	The air pressure of the oil atomizer is too low	Adjust the oil atomizer pressure/check the air source pressure
Large cylinder is poor	In-concentricity/damage of four claws	Adjust pawl distance and eccentric bearing bush/replace pawl
	Leakage/blow-by of large cylinder	Check the air pipe connector/replace the sealing ring
	Improper position/leakage/blow-by of five-way valve	Adjust the position of the five-way valve/replace the O-ring
	The air pressure of the oil atomizer is too low	Adjust the oil atomizer pressure/check the air source pressure
	The air intake of the cylinder is slow	Adjust the pedal limit screw of the five-way valve

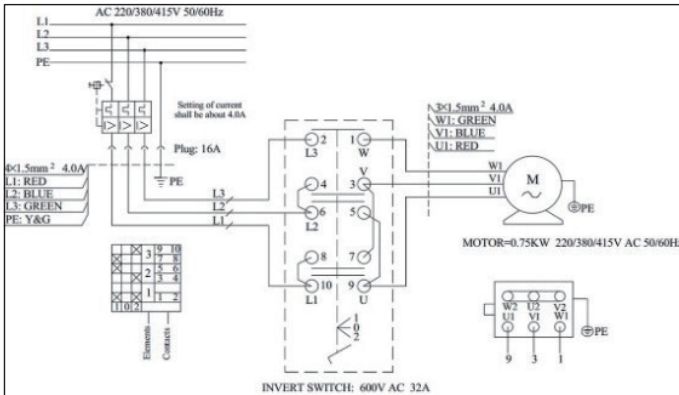
Motor is poor	The 220V motor starting capacitor is damaged	Replace the capacitance
	Phase loss of 380V power supply	Checking the power supply phase
	Belt is loose	Tighten the belt
Motor does not turn	The 220V motor starting capacitor is damaged	Replace the capacitance
	Phase loss of 380V power supply	Checking the power supply phase
	The switch is damaged or incorrectly connected	Check the connection to the switch or replace the switch
	No power or plug is not properly connected	Check the power supply/replace the plug
The hexagonal rod does not lock properly	Large clearance of locking plate	Adjust the clearance of the locking plate

Failures	Causes	Solutions
Large clearance of sliding arm	The upper and lower roller bearings and side jackscrew are not in the right position	Adjust the position
Cylinder blow-by	Piston seal ring is damaged/gas pipe joint is damaged	Replace it
Cylinder leakage	O-ring damage/piston rod scratch/gas pipe joint damage	Replace it
Five-way valve leakage	O-ring is damaged/air pipe joint is damaged	Replace it
Five-way valve blow-by	O-ring is damaged	Replace it
Oil atomizer leakage	O-ring damage/foreign bodies/gas pipe joint damage	Replace/clean up foreign bodies
The oil atomizer does not drip oil	Too small drops of oil/no oil	Increase the drops of oil/add oil
Leakage of rotary distributing valve	O-ring is damaged/air pipe joint is damaged	Replace it
Blow-by of rotary distributing valve	O-ring is damaged	Replace it
Pawls can open but cannot close/ jitter	Foreign body/no lubricating oil/deformation of pawl seat	Clean up foreign matter/add oil to lubricate/replace
Belt damage	Belt is too tight/pulley is not level with belt disc/overuse	Adjust position and levelness/replace it
The switch turns reversely	Wrong wiring	Reconnect/replace it
The gearbox is noisy	Loose screws/no lubricating oil/bearing damage	Lock screws/lubricate it/replace it

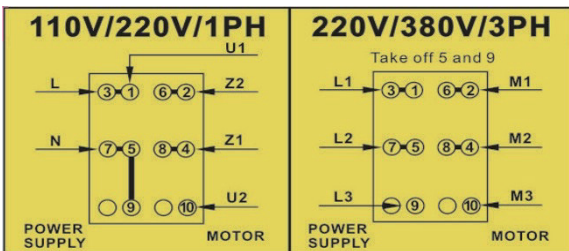
**Chapter IX Electric circuit and air circuit diagram**



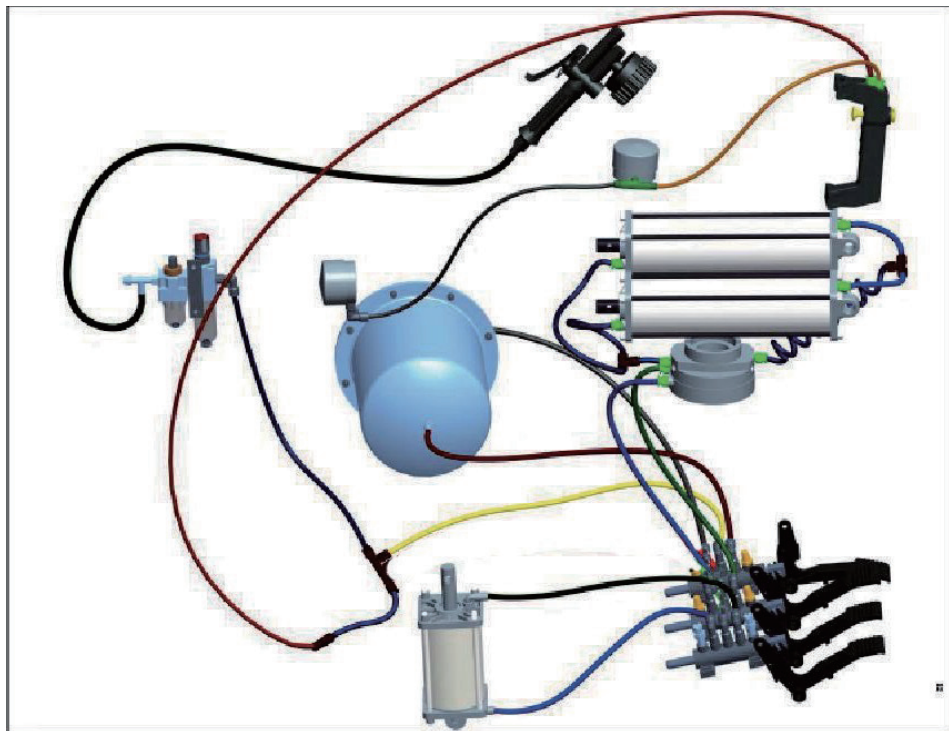
220V



380V

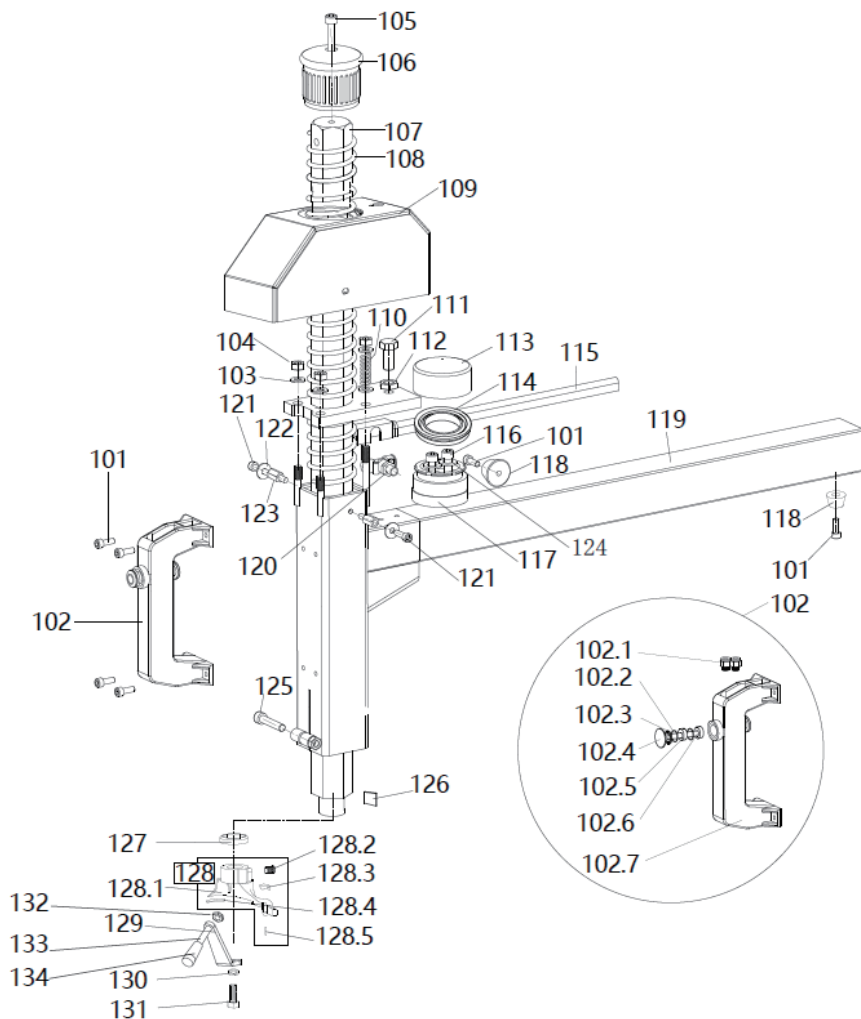


Key wiring diagram 220V/380V(99\*74)



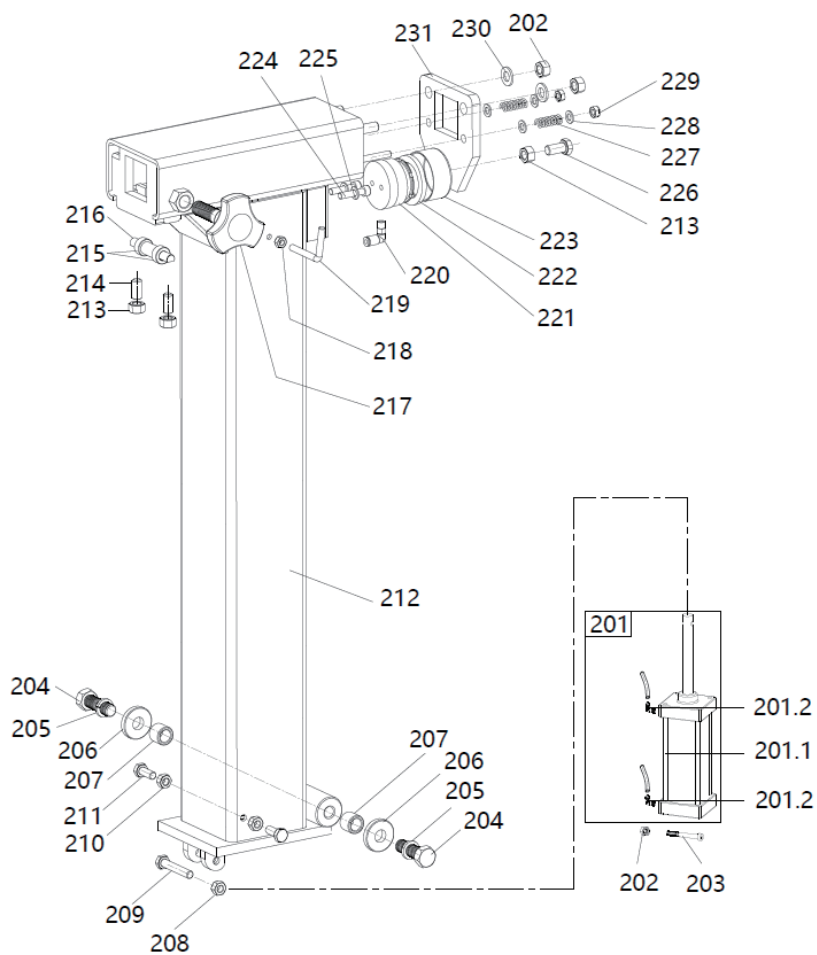
## Chapter X Product explosive view

### 1、 Slide arm assembly:





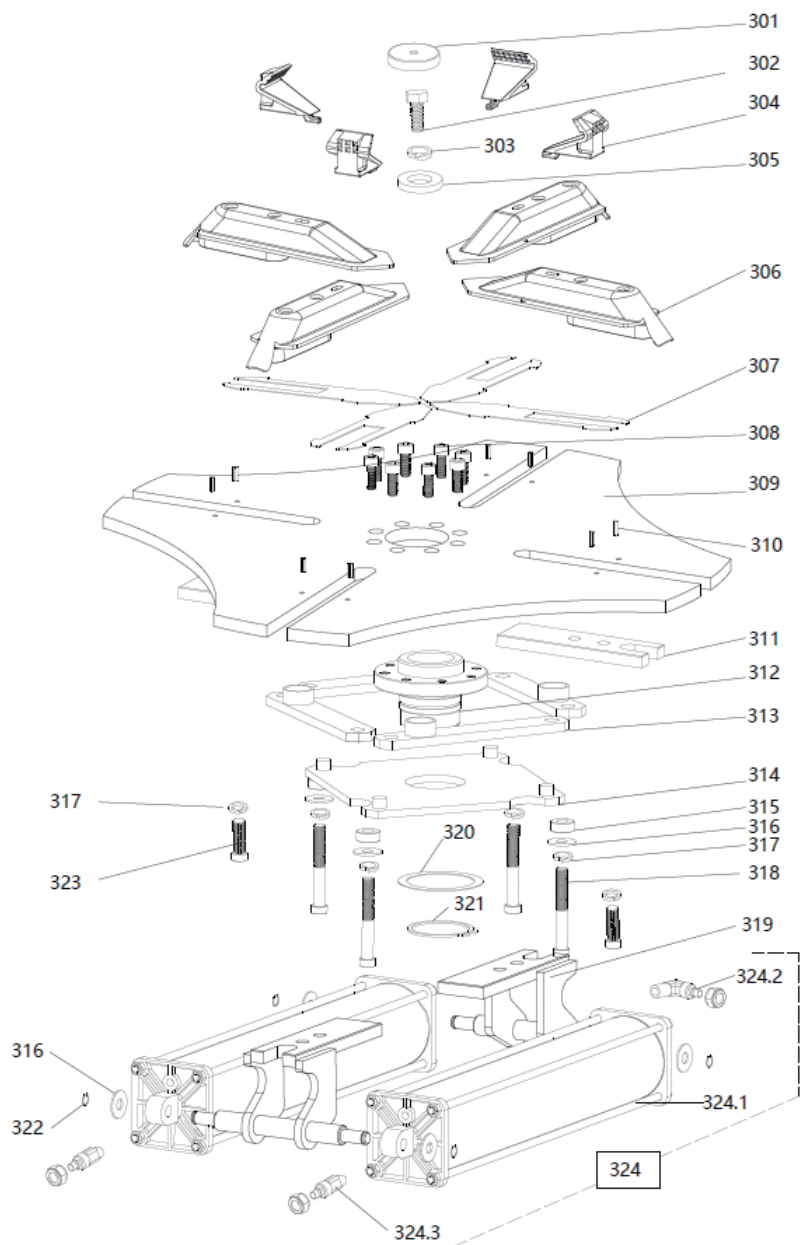
Drawing No.	SATA No.	Specification/name	Quantity
101	PAE2021-405	Allen cylindrical head screw M6×16	13
102	PAE1022-114	Control handle assembly	1
102.1	PAE1022-113	Quick plug 1/8-Φ6	2
102.2	PAE1022-115	Control handle O-ring 7.5*2.65	4
102.3	PAE1022-116	Control handle valve closure	1
102.4	PAE1022-117	Control handle stem cap	2
102.5	PAE1022-118	Control handle compartment sleeve	3
102.6	PAE1022-119	Stem	1
102.7	PAE1022-120	Control handle	1
103	PAE1021-114	Flat washer Φ8*17*1.5	6
104	PAE1021-716	Self-locking nut M8	5
105	PAE1021-118	Allen cylindrical head screw M8×40	1
106	PAE1021-102	Hex pressure bar cap S40	1
107	PAE1023H-127	Hex pressure rod	1
108	PAE1021-104	Pressure rod spring Φ3.5*55*600	1
109	PAE1025-04	Locking plate guard (H)	1
110	PAE1022-107	Lock spring	2
111	PAE1021-323	Allen bolt M12*35 grade 8.8 black	1
112	PAE1021-107	Nut M12 (thin)	1
113	PAE1022-130	(Nitriding) locks the cylinder block	1
114	PAE1022-133	Locking cylinder-V-ring seal 60*50*6.5	1
115	PAE1022-136	Tracheal guide groove	1
116	PAE1022-131	Allen cylindrical head bolt M6*40	2
117	PAE1022-134	Locking cylinder-piston (rubber)	1
118	PAE1022-137	Eco-friendly foot conical 32*25*20	2
119	PAE1025-05	Sliding arm (HB)	1
120	PAE1022-110	Quick screw tee 1/8-2*Φ6*4 (metal) intermediate thread	1
121	PAE1025-06	Allen cylindrical head bolt M6*12	2
122	PAE1021-114	Flat washer Φ8*17*1.5	2
123	PAE1025-07	M6 color zinc plated single-headed hexagonal iron column	2
124	PAE1022-132	Locking cylinder gasket (nylon)	2
125	PAE1021-118	Allen cylindrical head screw M8×40	1
126	PAE1021-116	Hexagonal rod bird's head manganese steel pad	1
127	PAE1021-120	Anti-shock pad S40*50*10	1
128	PAE1022-125	Disassembly head assembly	1
128.1	PAE1022-125A	Disassembly head	1
128.2	PAE1021-125	Allen concave end set screw 12*16	4
128.3	PAE1021-121	Disassembly head filling pad-front (Saigang)	1
128.4	PAE1021-122	Disassembly head filling pad-rear (Saigang)	1
128.5	PAE1021-124	Cylindrical pin M5*24(roller pin)	1
129	PAE1025-08	Hexagonal rod lower pressure plate	1
130	PAE2021-208	Elastic washer Φ10	1
131	PAE1021-127	Hexagon bolt M10*25	1
132	PAE1021-625	Nut M10 (thin)	1
133	PAE1025-09	Double head lead screw M10*80	1
134	PAE1025-10	Bakelite long handle sleeve M10*50 black	1

**2、 Column Assembly:**






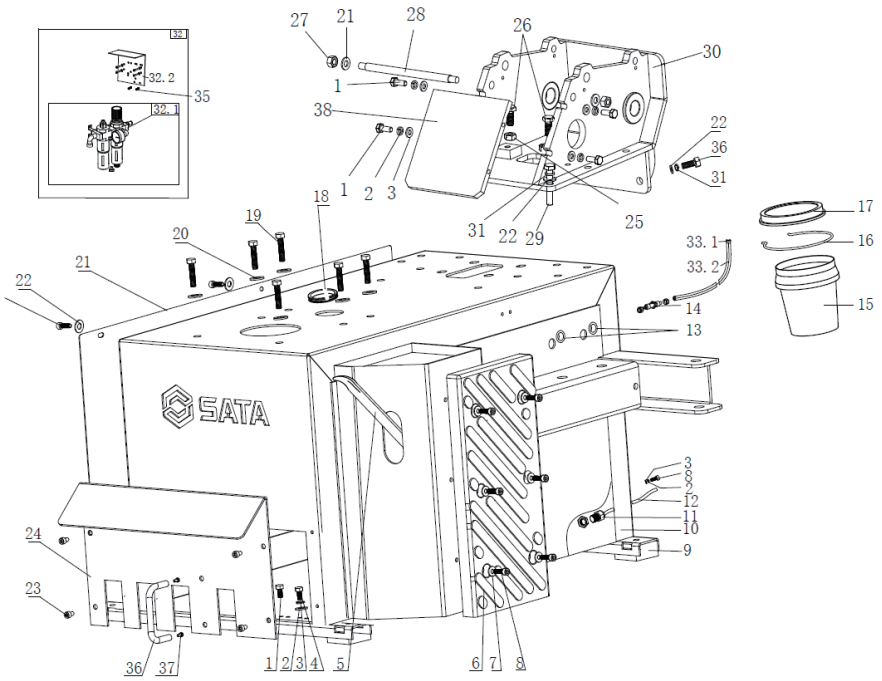
Drawing No.	SATA No.	Specification/name	Quantity
201	PAE1022-201	Inverted arm cylinder assembly (with fitting)	1
201.1	PAE1025-11	Cylinder 80*100	1
201.2	PAE1021-324B	Quick screw elbow 1/8- $\phi$ 8*5 (metal) belt rotation	2
202	PAE1022-202	Self-locking nut M12	3
203	PAE1022-203	Allen cylindrical head bolt M12*140	1
204	PAE1025-12	Hexagon bolt M16*55	2
205	PAE1021-303	Elastic washer $\phi$ 16	2
206	PAE1021-131	Large washer on the table	2
207	PAE1025-13	Bushing bearings, inner ring diameter 16, outer diameter 24, length 20	2
208	PAE1022-208	Self-locking nut M10	1
209	PAE1021-135	Hexagon bolt M10*60	1
210	PAE1021-625	Nut M10 (thin)	2
211	PAE1021-127	Hexagon bolt M10*25	2
212	PAE1025-14	Quadripartite Column (GC)	1
213	PAE1021-107	Nut M12 (thin)	2
214	PAE1025-15	Allen flat end set screw M12*20	2
215	PAE1025-16	Bushing bearings, inner ring inner diameter 12, outer diameter 22, length 10	2
216	PAE1025-17	Slide arm roller pin	1
217	PAE1025-18	Inverted arm locking handle (red triangle)(M18*60mm)	1
218	PAE2021-126	Nut M8 (white)	2
219	PAE1021-133	Column hooks	1
220	PAE1022-221	Push-in elbow 1/8- $\phi$ 6 (metal)	1
221	PAE1022-134	Locking cylinder-piston (rubber)	1
222	PAE1022-133	Locking cylinder-V-ring seal 60*50*6.5	1
223	PAE1022-130	(nitriding) Lock cylinder block C233011602A	1
224	PAE1022-131	Allen cylindrical head bolt M6*40	2
225	PAE1022-132	(Gasket 6) Locking cylinder gasket (nylon)	2
226	PAE1021-323	Allen bolt M12*35 grade 8.8 black	1
227	PAE1022-107	Lock spring	2
228	PAE1021-114	Flat washer $\phi$ 8*17*1.5	4
229	PAE1021-716	Self-locking nut M8	2
230	PAE1021-316	Flat washer $\phi$ 12*24*2	2
231	PAE1025-19	Sliding arm locking plate	1

**3、 Workbench assembly:**




Drawing No.	SATA No.	Specification/name	Quantity
301	PAE1021-301	Work platform cover	1
302	PAE1021-302	Hexagon bolt M16*40	1
303	PAE1021-303	Elastic washer $\phi$ 16	1
304	PAE1021-304	Jaws	4
305	PAE1021-131	Large washer on the table	1
306	PAE1023H-306	Jaw cap assembly	4
307	PAE1023H-307	Guide sheets	4
308	PAE1021-308	Allen cylindrical head bolt M8*20	8
309	PAE1025-20	Workbench plate	1
310	PAE1021-310	Flexible pin 5*16	8
311	PAE1023H-311	Underseat panel	4
312	PAE1021-312	Table cone sleeve	1
313	PAE1023H-313	Pull bar assembly	4
314	PAE1023H-314	Square turntable assembly	1
315	PAE1021-315	Tie rod pin sleeve	4
316	PAE1021-316	Flat washer $\phi$ 12*24*2	8
317	PAE1021-317	Elastic washer $\phi$ 12	8
318	PAE1021-318	Hexagon bolt M12*80	4
319	PAE1023H-319	C-jaw seat assembly	4
320	PAE1021-320	Square turntable gasket	1
321	PAE1021-321	Circlip (for shaft) $\phi$ 65	1
322	PAE1021-322	Circlips (for shafts) $\phi$ 12	4
323	PAE1021-323	Hexagon bolt M12*35	4
324	PAE1025-21	Clamping cylinder assembly 80*390	2
324.1	PAE1025-22	Cylinder 80*390	2
324.2	PAE1021-324B	Quick screw elbow 1/8- $\phi$ 8*5	2
324.3	PAE1021-324C	Quick screw through 1/8- $\phi$ 8*5	2

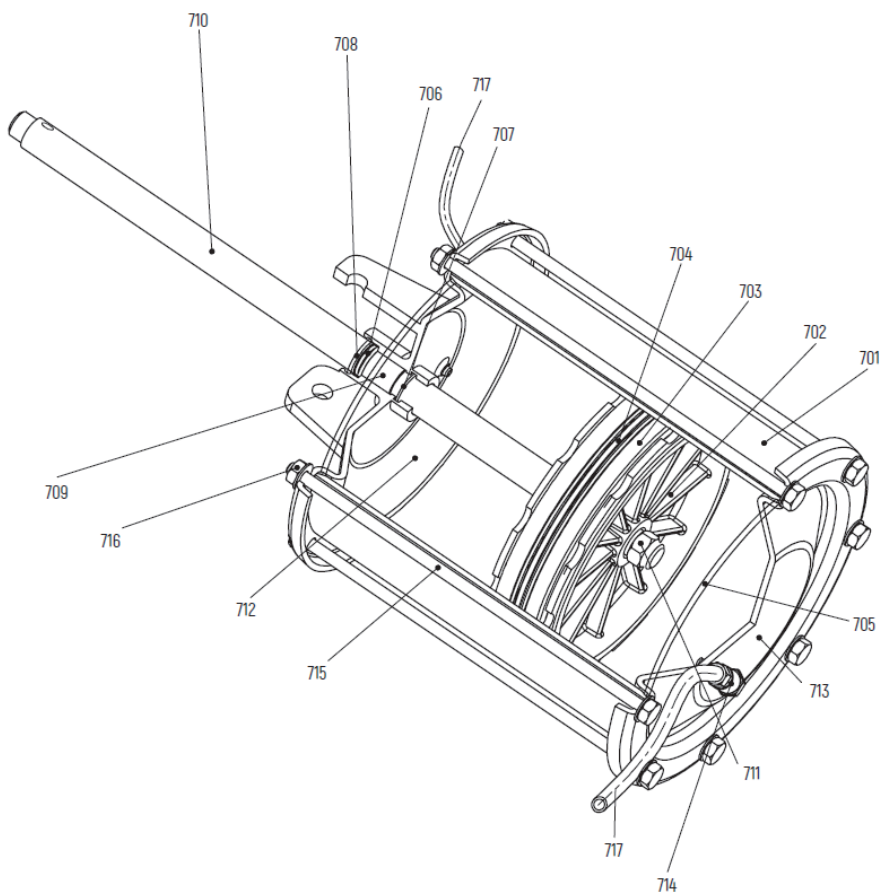
4、 Cabinet body assembly:





Drawing No.	SATA No.	Specification/name	Quantity
1	PAE1021-108	Hexagon bolt M8*20	4
2	PAE1021-113	Elastic washers $\phi 8$	4
3	PAE1021-110	Flat washer $\phi 8$	4
4	PAE1024-01	Hexagon bolt M8*16	1
5	PAE1021-5	Pry Bar 20"	1
7	PAE1024-02	Rubber plates for pressed tires	1
8	PAE1021-114	Flat washer $\phi 8*17$	6
9	PAE1021-308	Allen cylindrical head bolt M8*20	9
10	PAE1021-10	Rubber feet	4
11	PAE1022-11	Chassis	1
12	PAE1021-12	Cable screw G13.5	1
13	PAE1021-13	Power cord with plug 3.0m	1
14	PAE1021-14	Coil guard $\phi 16$	2
15	PAE1021-15	Quick screw separator through 2"8"5	1
16	PAE1021-16	Round oil drum	1
17	PAE1021-17	Oil cartridge rack	1
18	PAE1021-18	Round oil cartridge cap	1
19	PAE1021-19	Coil guard $\phi 45$ (hollow)	1
20	PAE1021-20	Hexagon bolt M10*160	6
21	PAE2021-209	Flat washer $\phi 10*20*2$	12
22	PAE1024-03	Left plate assembly	1
23	PAE2021-311	Flat washer $\phi 6*12$	2
24	PAE1021-24	Allen cylindrical head bolt M6*10	12
25	PAE1025-29	Front cover (inverted arm)	1
26	PAE1021-620	Nut (white) M10	2
27	PAE1022-H49	Hexagon bolt M10*40	2
28	PAE1022-208	Self-locking nut M10	2
29	PAE1023H-29	Adjust the screw	1
30	PAE1021-135	Hexagon bolt M10*60(half teeth)	4
31	PAE1025-02	Inverted arm support	1
32	PAE2021-208	Elastic washer $\phi 10$	6
33	PAE1025-30	Lubricator assembly (with stand)	1
33.1	PAE1021-33A	Lubricator assembly (without stand)	1
33.2	PAE1025-28	Lubricator bracket	1
34.1	PAE1021-34A	Fast female SP20-T	1
34.2	PAE1021-34B	Spring tube UC $\phi 8*5-5$	1
35	PAE2021-405	Allen cylindrical head bolt M6*16	2
36	PAE1021-127	Hexagon bolt M10*25	2
37	PAE1021-35	Round steel U-shaped handle $\phi 10$	1
38	PAE2021-118	Cross-grooved semi-round head with pad screw M4*10	2
39	PAE1025-03	Front cover plate of the inverted arm support	1

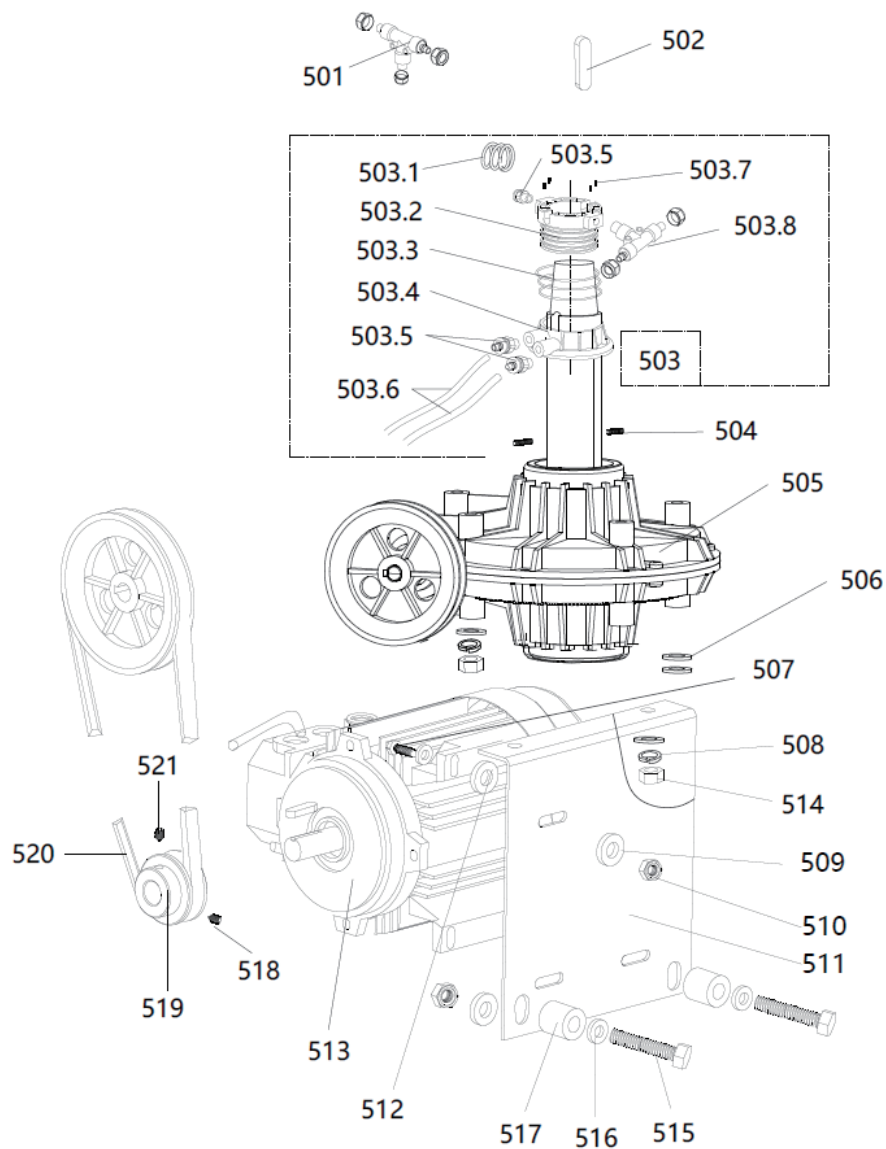
5 Large cylinder assembly:





Drawing No.	SATA No.	Specification/name	Quantity
700	PAE1024-31	Atmospheric cylinder (assembly)	1
701	PAE1024-32	Atmospheric cylinder barrel 200	1
702	PAE1024-33	Piston 200	1
703	PAE1024-34	V-ring	2
704	PAE1024-35	Piston guide rings	1
705	PAE1024-36	O-ring $\phi 197 \times 2.65$	2
706	PAE1021-706	Skeleton wiper seal	1
707	PAE1021-707	Sealing ring $\phi 19 \times 2.65$	1
708	PAE1021-708	$\phi 30$ holes with circlips	1
709	PAE1021-709	Copper sleeve 20*23*20	1
710	PAE1021-710	Piston rod	1
711	PAE1021-711	Allen nut M18*1.5*9mm	1
712	PAE1024-37	Upper cylinder head	1
713	PAE1024-38	Lower cylinder head	1
714	PAE1021-423	Quick-insert elbow 1/8- $\phi 8 \times 5$	2
715	PAE1021-715	Hexagon bolt M8*230mm	8
716	PAE1021-716	Self-locking nut M8	8
717	PAE1024-42	Trachea $\phi 8 \times 900$ mm	2

## 6、 motor part:

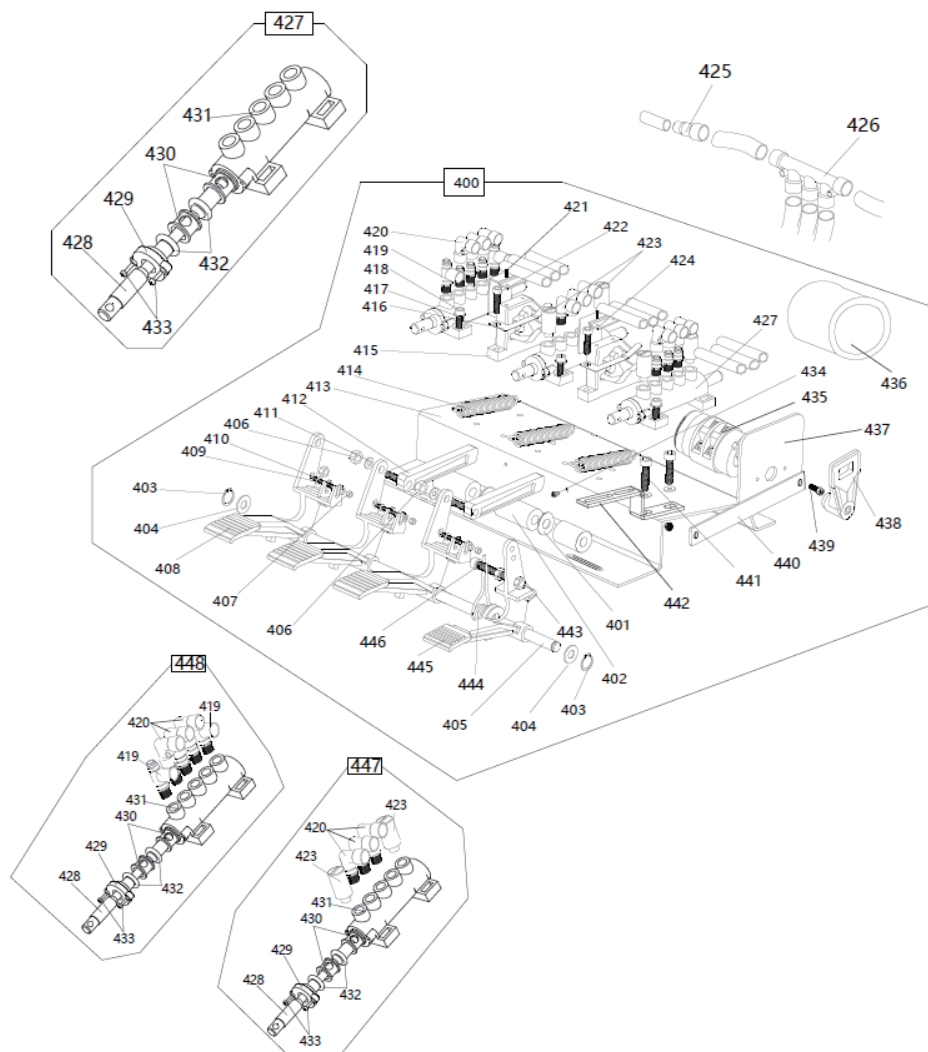






Drawing No.	SATA No.	Specification/name	Quantity
501	PAE1024-39	Quick screw tee 3* $\phi$ 8*5	1
502	PAE1024-40	A-type flat key 10*40	1
503	PAE1021-520	Rotary valve assembly	1
503.1	PAE1021-34B	Spring tube UC $\phi$ 8*5-5	1
503.2	PAE1024-12	Distributor spool	1
503.3	PAE1024-13	O-ring $\phi$ 61.5*3.55	3
503.4	PAE1024-14	Gas distribution valve sleeve	1
503.5	PAE1021-324C	Quick screw through 1/8- $\phi$ 8*5	3
503.6	PAE1024-15	Trachea $\phi$ 8*900	2
503.7	PAE1024-16	Allen concave end screw M4*6	4
503.8	PAE1024-17	Quick screw tee 1/8-2* $\phi$ 8*5	1
504	PAE1024-18	Allen concave end screw M10*35	2
505	PAE1024-19	Worm gear box assembly	1
506	PAE2021-209	Flat washer $\phi$ 10*20*2	8
507	PAE1024-20	Hexagon bolt M8*30	4
508	PAE2021-208	Elastic washer $\phi$ 10	6
509	PAE1021-110	Flat washer $\phi$ 8*24*2	6
510	PAE1021-716	Self-locking nut M8	4
511	PAE1024-21	Universal motor mount	1
512	PAE1024-22	Motor rubber pad $\phi$ 10*20*2	6
513	PAE1024-23	MOTOR 60HZ/110V/1.1KW	1
	PAE1024-24	Motor 50HZ/220V/1.1KW	
	PAE1024-25	Motor 50HZ/380V/0.75KW	
514	PAE1021-620	Nut (white) M10	6
515	PAE1024-26	Hexagon bolt M8*100	2
516	PAE1021-114	Flat washer $\phi$ 8*17	2
517	PAE1024-27	Anti-vibration adhesive pad	2
518	PAE1021-508A	Allen concave end screw M8*12	1
519	PAE1024-28	Motor pulleys	1
520	PAE1024-29	Vedge belt AV13*735	1
521	PAE1021-508A	Allen concave end screw M8*12	1

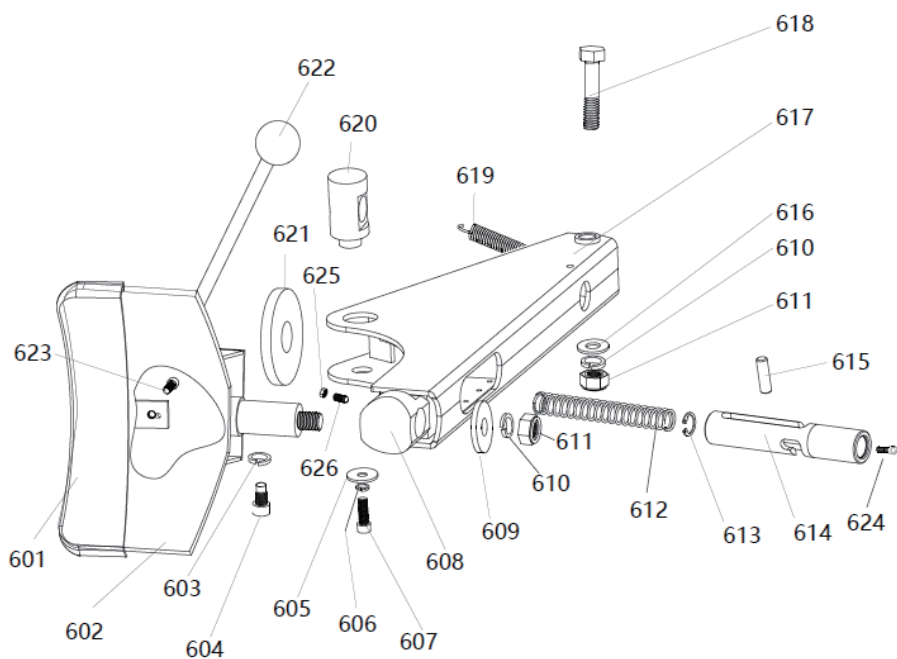
## 7. Pedal assembly:



Drawing No.	SATA No.	Specification/name	Quantity
400	PAE1022H-400	Four-foot assembly assembly	1
401	PAE1021-403	Flat washer $\phi 12 \times 24 \times 1.5$	2
402	PAE1021-437	Bushing 2	1
403	PAE1021-322	Circlip $\phi 12$	2
404	PAE1021-316	Flat washer $\phi 12 \times 24 \times 2$	9
405	PAE1021-404	shaft $\phi 12 \times 282$	1



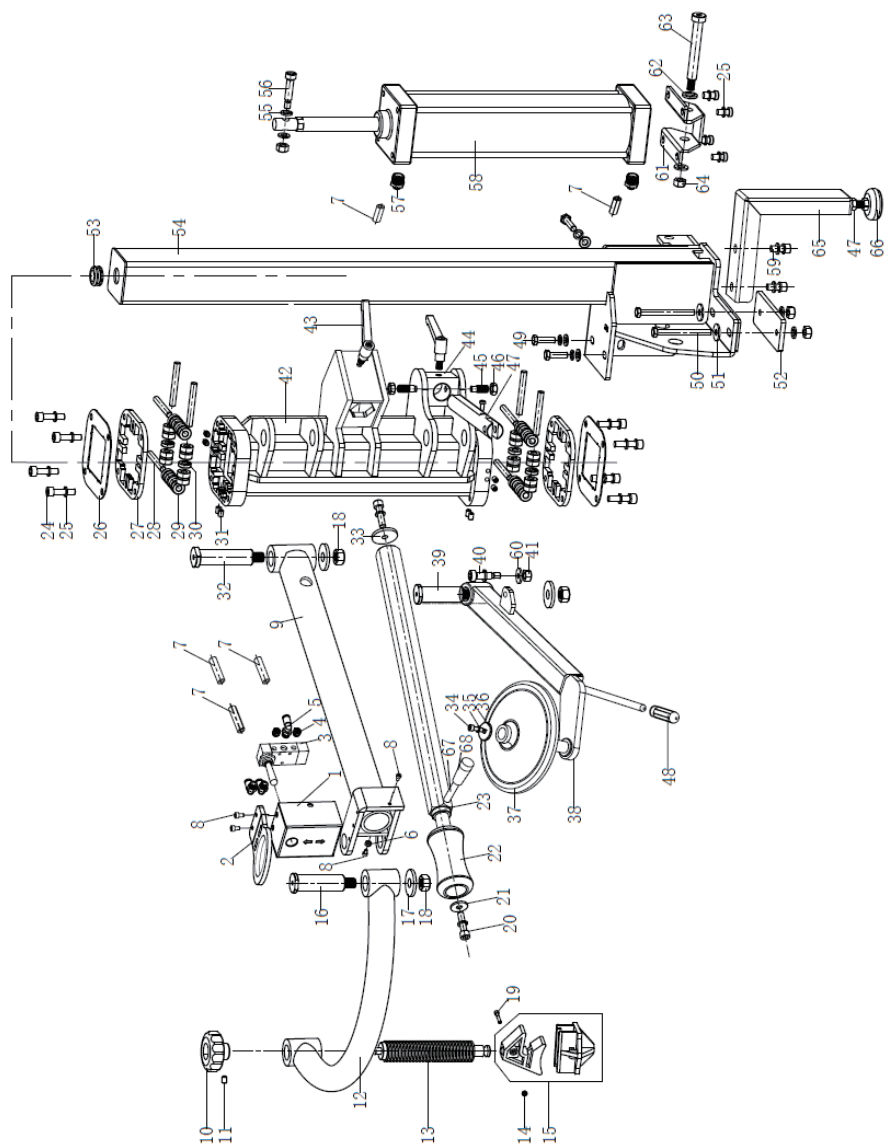
Drawing No.	SATA No.	Specification/name	Quantity
406	PAE1021-716	Self-locking nut M8	2
407	PAE1021-438	Self-locking nut M4	3
408	PAE1021-407	Big foot	3
409	PAE1021-439	Phillips grub screw M4*35	3
410	PAE1021-440	Flat washer $\phi 4$	3
411	PAE1021-114	Flat washer $\phi 8*17$	2
412	PAE1021-413	Cam linkage	2
413	PAE1022-413	Foot bracket group welding	1
414	PAE1021-435	Foot pedal pull spring	3
415	PAE1021-420	Cam body	2
416	PAE1021-421	Cam spring plates	2
417	PAE2021-311	Flat washer $\phi 6*12*1.5$	14
418	PAE1021-416	Allen round head bolt M6*25	11
419	PAE1022-419	Push-in control valve 1/8- $\phi 6$	2
420	PAE1021-423	Push-in elbow 1/8	9
421	PAE1021-418	Cross-groove semi-round head self-tapping screw 3*10	4
422	PAE1021-416	Allen round head bolt M6*25	4
423	PAE1021-422	Muffler 1/8	4
424	PAE1021-419	Cam cover	2
425	PAE1022-425	Push-in Pass- $\phi 6$ to $\phi 8$	1
426	PAE1022-426	Quick-plug 5* $\phi 8$	1
427	PAE1022-427	Five-way valve body assembly	3
428	PAE1022-428	5-way stem 12mm	3
429	PAE1021-429	5-way bonnet	3
430	PAE1021-430	5-way valve spacer sleeve	15
431	PAE1021-431	5-way valve body	3
432	PAE1021-432	O-ring 12*20*4	18
433	PAE1021-418	Cross-groove semi-round head self-tapping screw 3*10	6
434	PAE1022-434	Allen round head bolt M5*10	1
435	PAE1021-425	Transfer switch	1
436	PAE1021-443	Switch sleeve	1
437	PAE1022-8	Switch bracket 1	1
438	PAE1024-09	Inverted switch handle	1
439	PAE1021-108	Allen bolt M8*20	4
440	PAE1022-3	Switch bracket 2	1
441	PAE1021-24	Allen cylindrical head bolt M6X16	2
442	PAE1022-18	Torsion spring limit bracket	1
443	PAE2021-126	Nut M8	2
444	PAE1021-409	Foot pedal torsion spring $\phi 3.5*20.4*70$	1
445	PAE1021-410	Big foot pedal	1
446	PAE1024-20	Hexagon bolt M8*30	1
447	PAE1024-10	5-way valve assembly	2
448	PAE1021-448	5-way valve assembly	1

**8、Shovel arm assembly:**




Drawing No.	SATA No.	Specification/name	Quantity
601	PAE1023H-41	Tire shovel sheath	1
602	PAE1021-602	Tire shovel	1
603	PAE1021-603	Elastic washer $\phi 14$	2
604	PAE1021-604	Positioning nails	2
605	PAE1021-605	Flat washer $\phi 8 \times 30 \times 2$	1
606	PAE1021-113	Elastic washer $\phi 8$	1
607	PAE1021-108	Hexagon bolt M8*20	1
608	PAE1021-608	Tire blade hinge	1
609	PAE1021-131	Large washer on the table	1
610	PAE1021-303	Elastic washer $\phi 16$	2
611	PAE1021-132	Self-locking nut M16	2
612	PAE1021-612	Adjust the sleeve spring $\phi 1.5 \times 19.5 \times 125$	1
613	PAE1021-613	Holes with circlips $\phi 20$	1
614	PAE1021-614	Cylinder piston rod adjustment sleeve	1
615	PAE1021-615	Atmospheric cylinder piston rod pin shaft 10*33	1
616	PAE1021-616	Flat washer $\phi 16 \times 30 \times 2$	1
617	PAE1021-617	Shovel arm	1
618	PAE1021-618	Hexagon bolt M16*100	1
619	PAE1024-30	Shovel arm pull spring $\phi 2.5 \times 20 \times 70$	1
620	PAE1024-41	Cylinder tie rod sleeve	1
621	PAE1021-621	Shovel arm pad (thin)	1
622	PAE1021-622	Black ball handle M16*50	1
623	PAE1021-24	Allen cylindrical head bolt M6*10	1
624	PAE2021-405	Allen cylindrical head bolt M6*16	1
625	PAE1021-625	Nut M10 (thin)	1
626	PAE1021-626	Allen concave end set screw M10*20	1

## 9、Right auxiliary arm:





Drawing No.	SATA No.	Specification/name	Quantity
1	PAE1022-H1	Hand push valve guard box	1
2	PAE1022-H2	handle	1
3	PAE1022-H3	Hand push valve	1
4	PAE1021-422	Muffler 1/8	2
5	PAE1022-221	Push-in elbow 1/8- $\phi$ 6	3
6	PAE2021-121	Nut M6	1
7	PAE1022-H7	Trachea 6×3500mm	3
8	PAE1021-24	Allen cylindrical head bolt M6*10	5
9	PAE1022-H9	Right cross arm	1
10	PAE1022-H10	Plum blossom handle 12*80	1
11	PAE1022-H11	Allen concave end screw 6*6	1
12	PAE1022-H12	Bend arms	1
13	PAE1022-H13	Double wire screw	1
14	PAE1022-H14	Self-locking nut M6	1
15	PAE1022-H15	Tire press	1
16	PAE1022-H16	Horizontal arm pin two	1
17	PAE1021-131	Large washer on the table	3
18	PAE1021-132	Self-locking nut M16	3
19	PAE2021-313	Allen cylindrical head bolt M6*35	1
20	PAE1021-127	Hexagon bolt M10*25	2
21	PAE2021-108	Flat washer $\phi$ 10*30*2	1
22	PAE1022-H22	Tire Roller	1
23	PAE1025-23	Hex pressure rod shaft	1
24	PAE1022-27	Hexagon bolt M10*30	8
25	PAE2021-208	Elastic washer $\phi$ 10	16
26	PAE1022-H26	Roller cover	2
27	PAE1022-H27	Roller cleats	2
28	PAE1022-216	Bearing steel cylindrical pin M10*80	8
29	PAE1022-H29	Needle roller bearings with inner ring NA6900	16
30	PAE1022-218	Deep groove ball bearings 6900Z	8
31	PAE1021-508A	Allen concave end screw 8*12	8
32	PAE1022-H32	Transbone pin one	1
33	PAE1022-206	Locking gasket	1
34	PAE1021-308	Allen cylindrical head bolt M8*20	1



Drawing No.	SATA No.	Specification/name	Quantity
35	PAE1021-113	Elastic washers $\phi 8$	1
36	PAE1022-H36	Enlarge flat washer 8	1
37	PAE1022-H37	Placenta	1
38	PAE1022-H38	Right support for the fetal arm	1
39	PAE1022-H39	Arm pins	1
40	PAE1022-H40	Plug screw M12*30	1
41	PAE1022-208	Self-locking nut M10	3
42	PAE1025-24	Lifting slide sleeve	1
43	PAE1022-H43	Figure-7 locking handle	2
44	PAE1022-H44	Turn the block	1
45	PAE1022-H45	Locking plate dowels	2
46	PAE1021-107	Nut M12	3
47	PAE1022-H47	Tire locking lever	1
48	PAE1022-H48	Shovel arm handle sleeve	1
49	PAE1022-H49	Hexagon bolt M10*40	4
50	PAE1022-H50	Hexagon bolt M10*120	2
51	PAE2021-212	Thickened flat washer 10*25*4	8
52	PAE1022-H52	Column fixing splint	1
53	PAE1022-H53	Coil guard $\phi 28-5$	3
54	PAE1025-25	Column assembly	1
55	PAE1021-317	Elastic washer $\phi 12$	1
56	PAE1022-H56	Plug screw M12*40	1
57	PAE1022-H57	Push-in Pass-Through 1/2- $\phi 6$	2
58	PAE1022-H58	Standard cylinder $\Phi 100 \times 350$	1
59	PAE1021-127	Hexagon bolt M10*25	2
60	PAE2021-209	Flat washer $\phi 10 \times 20 \times 2$	1
61	PAE1022-H61	Cylinder base	1
62	PAE1021-303	Elastic washer $\phi 16$	1
63	PAE1022-H63	Plug screw M16*110	1
64	PAE1022-202	Self-locking nut M12	1
65	PAE1022-H65	Support rod	1
66	PAE1022-H66	Rubber shock-absorbing feet with cup pads	1
67	PAE1025-09	Double head lead screw M10*80	1
68	PAE1025-10	Bakelite long handle sleeve M10*50 black	1





适用型号 / Model: AE1025H/AE1025H-3

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世达汽车科技（上海）有限公司

SATA Automotive Technology (Shanghai) Co., Ltd

客户服务：上海市嘉定区南翔镇静唐路 988 号 5-12 幢

Customer service: Building 5-12, No. 988, Jingtang Road, Nanxiang Town, Jiading District, Shanghai

邮编 / Post: 201802

电话 / Tel.: (86 21) 6061 1919

传真 / Fax: (86 21) 6061 1918