



Food Technology Solutions

食品技术解决方案



**PIN WORKER UNIT**  
**捏合机**

#### **PIN WORKER UNIT | TYPE PWU**

#### **捏合机 | PWU 型**

The pin worker unit is mainly used for intensive treatment of margarine and edible fat products, in order to achieve a proper crystallisation and right texture during the production process.

捏合机主要用于人造黄油和食用油脂产品的强化处理，以便在生产过程中获得适当的结晶和适宜的质地。

Depending on product and desired consistency the pin worker unit can either be placed between the cooling steps or at the end of the cooling process.

根据产品和所需的一致性，捏合机可以置于冷却步骤之间或冷却过程结束时。

The RONO pin worker unit is based on proven technique. Our further development enhanced the pin worker to meet best flexibility, highest standard of hygiene, very long life expectancy and easy maintenance in daily operation. The RONO pin worker unit offers highest flexibility to the production process and allows to work with a wide diversity of fat products. Adjustments to the level and intensity of treatment can be made by adjustment of the pin rotor speed.

RONO 捏合机是基于成熟的技术设计的。我们的进一步研发提高了捏合机性能，以满足最佳的灵活性，符合最高的卫生标准，超长的预期寿命和易于维护的日常操作。RONO 捏合机为生产工艺提供了最高的灵活性，并适用于多种脂肪产品。通过调整销转子转速，可以调整处理水平和强度。

Production capacity and volume of the pin worker unit offers a variable duration of

kneading. Product crystallisation can be influenced by the choice of high or lower pressure production.

因捏合机的产能和体积，揉搓时间灵活。高压或低压生产的选择会影响产品结晶。

**BENEFITS**

**优点**

- |   |  |
|---|--|
| ✓ Wide diversity of fat products            | ✓ Proven technique and continuous innovations      |
| ✓ 脂肪产品种类繁多                                  | ✓ 成熟的技术和持续的创新                                      |
| ✓ Highest flexibility to production process | ✓ Tailor made equipment                            |
| ✓ 生产工艺的最高灵活性                                | ✓ 量身定制的设备  |
| ✓ Versatile adjustment possibilities        | ✓ Made in Germany                                  |
| ✓ 多种调整可能性                                   | ✓ 德国制造   |
| ✓ Hygienic design                           | ✓ Solid design - modular and variable              |
| ✓ 卫生设计                                      | ✓ 实体设计-模块化和灵活                                      |
| ✓ Standard gearbox                          | ✓ Mounted on a baseplate or on top of the RONOTHOR |
| ✓ 标准齿轮箱                                     | ✓ 安装在底板或 RONOTHOR 顶部                               |

## PIN WORKER UNIT

### 捏合机

Types & Variations

类型和变体

#### ■ Cylinder sizes

#### 筒体尺寸

250 mm, 336 mm | Different lengths available

250mm、336mm | 提供不同长度

#### ■ Volumes

#### 体积

The pin worker unit is available in various sizes and with different volumes: 25 ℓ, 50 ℓ, 100 ℓ, 120 ℓ, und 180 ℓ,

捏合机有多种尺寸和不同体积： 25 ℓ、50 ℓ、100 ℓ、120 ℓ, 和 180 ℓ,

#### ■ Modular Design

#### 模块化设计

The pin worker unit can be build as stand-alone version or together with further pin worker units, mounted on a solid baseplate. Alternatively the PWU can be mounted on top of the RONOTHOR

捏合机可以作为独立版本制造，也可以与其他捏合机一起安装在坚固的底板上。或者，PWU 可以安装在 RONOTHOR 的顶部

#### ■ Working pressure range

#### 工作压力范围

Up to 120 bar

高达 120 巴



<b>TECHNICAL DATA</b>					
<b>技术数据</b>					
PWU size in litre [ℓ] PWU 尺寸 (升) [ℓ]	<b>25</b>	<b>50</b>	<b>100</b>	<b>120</b>	<b>180</b>
Gear Motor [kW] 齿轮马达 [kW]	5,5	7,5	11	15	18,5
RPM Rotor [1/min, 50 Hz] 转速转子 [1/min, 50 Hz]	50-400	50-350	50-400	50-350	50-350
Frequency Converter [kW] 变频器 [kW]	5,5	7,5	11	15	18,5
Cylinder Volume in litre [ℓ] 筒体容积 (公升) [ℓ]	25	50	100	120	180
Design pressure [bar] 设计压力 [巴]	120	120	120	120	120
Temp. Sensor PT100 [pc.] 温度传感器 PT100 [件]	1	1	1	1	1
<b>Recommended Water Temperation Unit</b>					
<b>推荐的水温调节装置</b>					
Water Heater Volume in litre [ℓ] 热水器容积 (升) [ℓ]	<b>60</b>	<b>60</b>	<b>60</b>	<b>60</b>	<b>60</b>
Heating element [kW] 加热元件 [kW]	9	9	9	9	9
Water Circulation pump [kW] 水循环泵 [kW]	0,37	0,37	0,37	0,37	0,37

RONO Maschinenbau GmbH  
Ringstrasse 6 | 23923 Selmsdorf-  
Germany

■ Phone +49 (0) 388 23 - 54 48 0  
电话: +49 (0) 388 23 - 54 48 0  
■ Fax +49 (0) 388 23 - 54 48 88  
传真: +49 (0) 388 23 - 54 48 88

■ E-Mail [info@ro-no.de](mailto:info@ro-no.de)  
电子邮箱: info@ro-no.de  
■ Web [www.ro-no.com](http://www.ro-no.com)  
网址: www.ro-no.com

**RONO**  
Food Technology  
Solutions  
食品技术解决方案