

轮胎定型硫化机

Tyre Shaping And Curing Press

轮胎定型硫化机是汽车外胎硫化专用设备，可用于各种普通轮胎和子午线轮胎的硫化。机器具备从装胎、合膜、卸胎及后充气的全过程自动化生产能力，亦可实现手动操作。结合日本神钢最新技术生产的硫化机，结构先进，质量可靠。电气采用PLC控制，可靠度高，维修、更换硫化规格方便。

This machine is specially used for the vulcanization of automobile tire including all kinds of common and radial tires. The whole curing process, from loading, mould closing, unloading to PCI, have been realized automatic production. In the meantime, it can also be operated by hand. Based on the advanced technology introduced from Kobe Steel Co., Ltd. Japan, the machine is of superior structure and reliable quality. The control system adopts PLC that has assured rare breakdown, convenient maintenance and changing of curing size.



① K350-45M11A 机械式轮胎硫化机
K350-45M11A Mechanical curing press



② 3500H-51VCI 液压式轮胎硫化机
3500H-51VCI Hydraulic curing press



③ K1000-65.5M1 机械式轮胎硫化机
K1000-65.5M1 Mechanical curing press



④ LL-B2250/970(88*) 工程轮胎硫化机
LL-B2250/970(88*) OTR Tire curing press

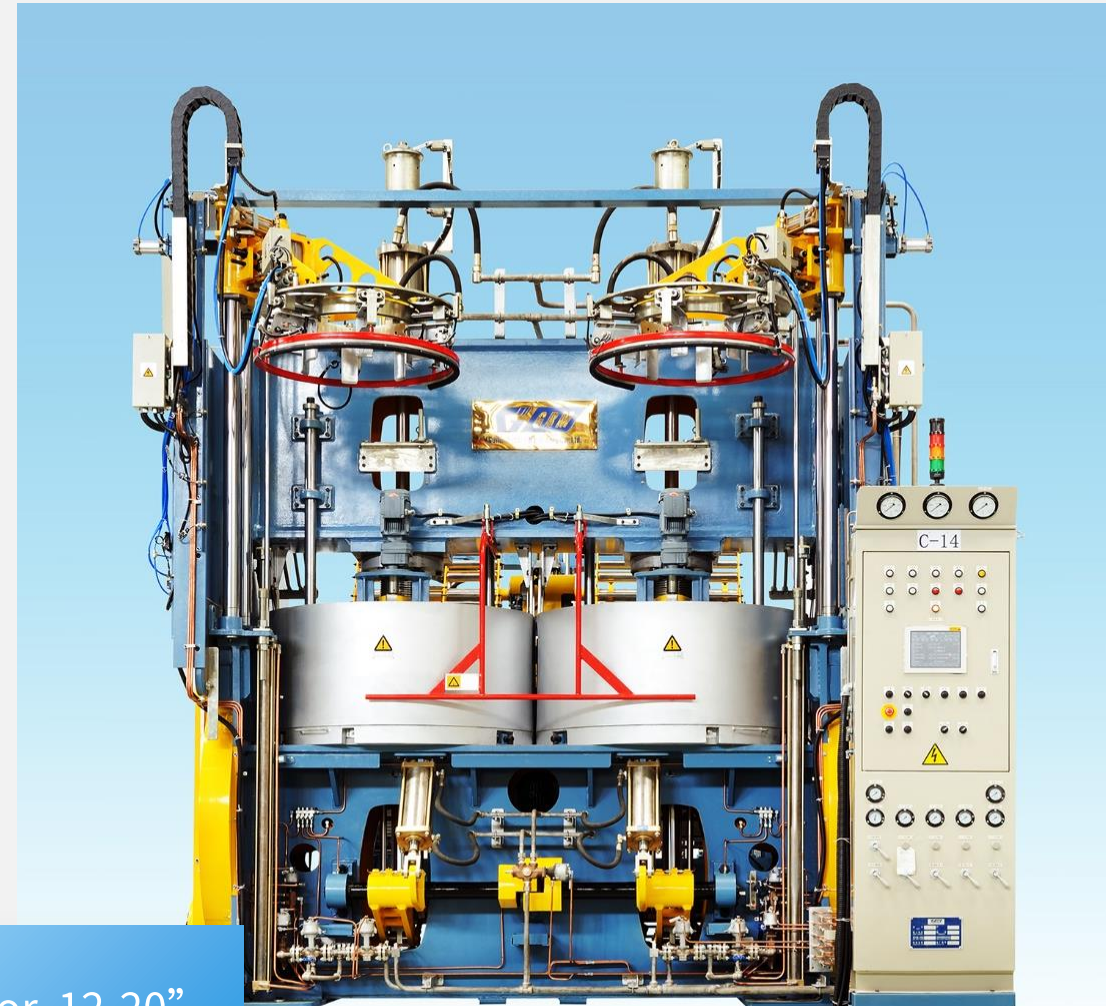


Product Brief

- Main size: 45", 48", 51" and 55", etc.
- Mold motion driven by motorized mechanical, other driven by hydraulic water or air.
- Suitable for PCR and LT tire curing.
- High Automation.
- PCI for option supply.

Product Feature

- Optimized structure increases the stability of run.
- Less non-curing time, increase production efficiency.
- Standard interface for installation, more easy for commissioning.
- Safety protection unit assures the safety of run.



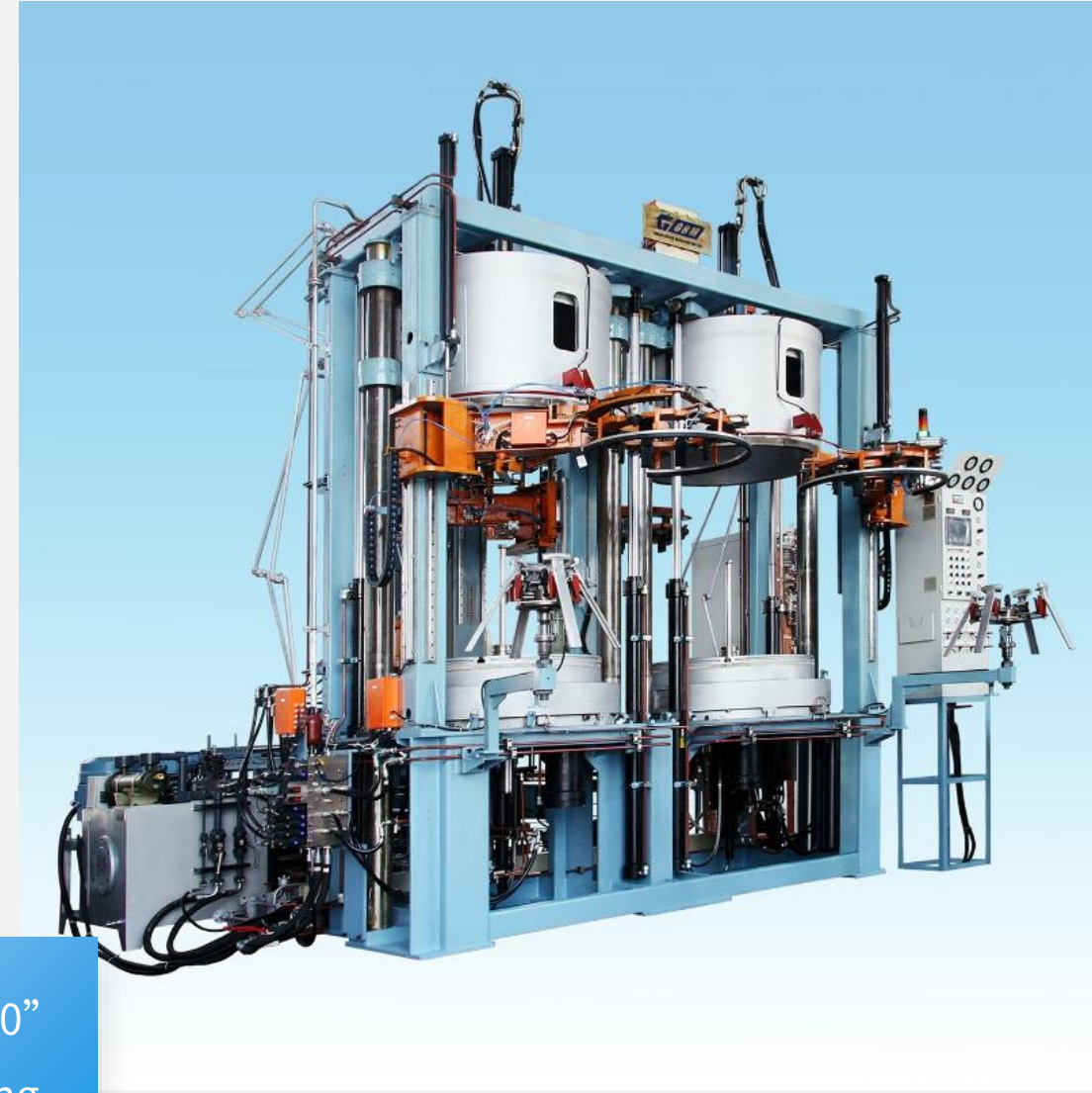
Suitable for 12-20"
PCR & LT tire curing

Product Brief

- Main size: 45", 48", 51" and 55", etc.
- Mold motion driven by oil hydraulic, other driven by hydraulic or air.
- Suitable for PCR and LT tire curing.
- High Automation.
- PCI for option supply.

Product Feature

- Mold uniform force distribution raises quality of cured tire.
- Driven by hydraulic, rapid reaction and reliable run .
- Option of servo drive system with less power consumption and noise.
- Positioning by LVDT or sensors, encoder provide simple control
- Safety protection unit assures the safety of run.



Suitable for 12-20"
PCR & LT tire curing

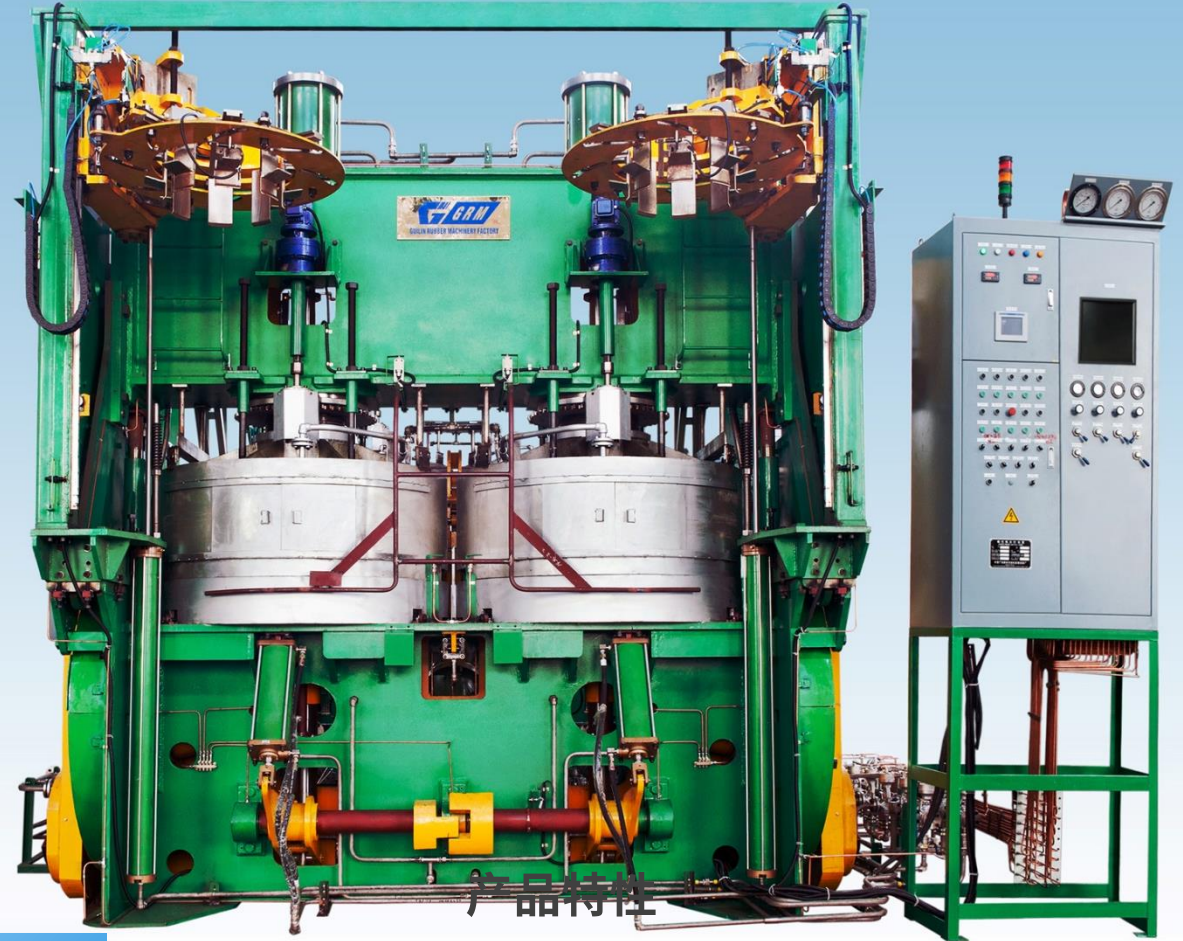


Product Brief

- Main size: 55", 63.5", 65.5", 67" and 70", etc.
- Mold motion driven by motorized mechanical, other driven by hydraulic water or air.
- Suitable for TBR tire curing.
- High Automation.
- PCI for option supply.

Product Feature

- Optimized structure increases the stability of run.
- Loader adopts double-column structure assures smooth and reliable operation
- Standard interface for installation, more easy for commissioning.
- Safety protection unit assures the safety of run.



Suitable for 16-24"
TBR tire curing



Product Brief

- Main size: 63.5", 65.5", 67" and 70", etc.
- Mold motion driven by oil hydraulic, other driven by hydraulic or air.
- Suitable for TBR tire curing.
- High Automation.
- PCI for option supply.

Product Feature

- Open type structure increases maintenance room, assures the repeatability .
- Auto and intelligent mold height adjusting.
- Excellent water-discharging design and control technique, energy saving and consumption reduction, raises the quality of cured tire .
- Option of servo drive system with less power consumption and noise.



Suitable for 16-24"
TBR tire curing



Product Brief

- Main size: 72", 75", 85", 88", 91", 100", 118", 122", 130" and 210", etc.
- Mold opening and closing is driven by mechanical, other driven by hydraulic water or air.
- Suitable for OTR, Agriculture tire curing.
- PCI for option supply.

Product Feature

- Mechanical structure increases the stability of run.
- Larger tire catching size suitable for difference tire size.
- Less time requirement for site installation and commissioning.



Suitable for 18-51"
OTR tire curing



Product Brief

- Main size: 75”, 88”, 122”,150” , 170 ”,188” and 210”, etc.
- Difference structure design for vary press size.
- Both Double cavities and single cavity design for some press size.
- PCI for option supply for some press size.

Product Feature

- Hydraulic press structure occupied less space with high efficiency.
- Adopted new heat insulator, energy saving and consumption reduction.
- Provision for rapid mold –change mechanism shorten mold changing time and labor force.



Suitable for 18-63”
OTR tire curing

载重胎，侧板式液压轮胎定型硫化机 Hydraulic Tyre Curing Press for TBR (Side-Plate Type)

本机为液压式硫化机，采用双模侧板框架独立单元结构形式，横梁垂直升降。采用滚轮或直线导轨开合模导向系统，侧板插销锁模机构，每模4缸加压。模具用热板加热，中心机构为BOM型。配备直线导轨式装、卸胎机械手，或摆动式卸胎机构。根据用户要求可配置电动调模装置、活络模驱动装置、后充气、存胎器等。硫化管道系统可定制。

本机采用一个液压站驱动一台或五台硫化机，开合模调速采用比例控制技术。

本机控制系统采用PLC可编程控制器为实时控制核心，以工业计算机为人机操作界面，可实现硫化过程参数设置，硫化实时参数采集、保存、报警及历史参数直观查询等，具有以太网接口，支持硫化机集群组网。

本机适用于硫化载重子午胎和斜胶胎，适用于氮气或蒸汽硫化工艺。

This Curing Press is of hydraulic type and adopts dual-cavity Side-Plate Frame independent unit structure. Each beam moves up and down vertically on guiding rails. It uses Roller/Linear Guide Rail Mould Open/Close Guidance System and equipped with Side-Plate Safety Mould Locking System. Each mould is heated by Platen and served by 4 Oil Pressuring Cylinders on the bottom. Center Mechanism is of BOM type. This Curing Press is equipped with Double-Column Vertical chuck for tyre loading and unloading or swing type Unloading device. As per customer's request, Electric Mould-Adjusting Device, SMO Driving Device, PCI and Green Tyre Holder are available. Curing Piping can also be made to order.

One Oil Hydraulic Station can drive and control one or up to five Curing Presses. Proportional Electro-Hydraulic Control Technology is adopted for Mould Open/Close Speed Adjustment.

This Curing Press uses PLC for Real-time Control and industrial PC for Human-Machine Operation Interface. It can realize parameters setting during Curing Cycle and Real-time data collection / preservation, alarming, whereby historical parameters intuitive query can also be realized through this system. With Ethernet interface, Curing Press Group-Management is available.

This Curing Press is applicable for curing TBR and bias tyres with Nitrogen or Steam used as curing medium.



LLY-B1600×3800×2 LLY-B1665×4580×2A
LLY-B1750×4600×2 LLY-R1780×4700×2

液压轮胎硫化机技术参数
Hydraulic Tyre Curing Press Technical Data

项 目 ITEM	单 位 UNIT	规 格 SPECIFICATIONS			
		B1600	B1665	B1750	R1780
轮胎硫化机规格 Press Size		63,5"	65,5"	70"	70" R
硫化室数目 Curing Cavity No.		2	2	2	2
硫化室保温罩内径 Mould Shield I.D.	mm	Φ1600	Φ1665	Φ1750	Φ1780
最大合模力 Max. Squeezing Force	kN	3800×2	4580×2	4600×2	4700×2
硫化模型高度 Mould Height	mm	400-700	400-700	400-700	560-640
中心机构结构形式 Center Mechanism		BOM	BOM	BOM	RIB
适用钢圈直径 Tyre Bead Diameters	in	20-25	16-25	20-25	20-25
硫化轮胎最大外径 Max. O.D. of Cured Tyre	活络模SGM	mm	Φ1135	Φ1230	Φ1300
	两半模2-Piece Mold	mm	Φ1235	Φ1300	Φ1400
硫化轮胎最大厚度 Max. Section Width of Cured Tyre	mm	500	500	500	500
胎坯最大高度 Max Green Tyre Height	mm	650	700	600	720
理论开/合模时间 Designed Mould Open/Close Time	s	40	40	40	40
机械手可抓取最大重Max. Load of VCL	kg	150	150	150	150
模具最大重量 Max Mould Weight	kg	6500	6500	6500	6500
高压油压力HP Oil Pressure	MPa	16	16	16	16
低压油压力LP Oil Pressure	MPa	8	8	8	8
硫化介质最大外压Max. External Pressure	MPa	1.4	1.4	1.4	1.4
硫化介质最大内压Max. Internal Pressure	MPa	2.8	2.8	2.8	2.8
动力水压力Hydraulic Water Pressure	MPa	2.1	2.1	2.1	2.1
动力空气压Compressed Air Pressure	MPa	0.7	0.7	0.7	0.7
控制空气压力Control Air Pressure	MPa	0.35	0.35	0.35	0.35
机器外形尺寸Machine Dimensions		5.9×4.2×7.0	6.0×6.5×7.4	6.0×4.2×7.8	6.0×4.2×7.5
适合最大轮胎型号 Max. tyre type		340/85R24	380/70R24	17.5R25	17.5R25

注：硫化轮胎最大外径和硫化轮胎最大厚度两尺寸与模具有关，表中硫化轮胎最大外径为预计值、硫化轮胎最大厚度为机器可通过的轮胎最大厚度值。

Remark: As Max.O.D.and Max.Section Width of cured tyre are related to the mould dimensions, the Max.O.D. shown in the above table are estimated values. And value for Max. Section Width is the Max.size which can pass through the curing cavities.