



invernizzi presse
WE WORK BEST UNDER PRESSURE 

AEROSOL
ENDS 

invernizzi.com

REVOLUTIONARY EQUIPMENT FOR AEROSOL ENDS

The innovative equipment of INVERNIZZI PRESSE, designed to produce particular molding parts, in this specific case domes for spray cans, with material of reduced thickness and of different hardness from TH435 to TH550, with or without coating (EN 10202-04). The use of these materials with higher hardness values than the materials normally used for the production of similar pieces, allows to obtain particular molding parts using a tin foil with a reduced thickness. In fact, with this system the end user has the option to produce the domes using a material hardness of TH550 and a thickness of 0.32 mm for the aerosol dome of 60 mm diameter and 15 bar and a thickness of 0.33 mm for the 60 mm diameter aerosol dome and 18 bar.



DEEP DRAWING

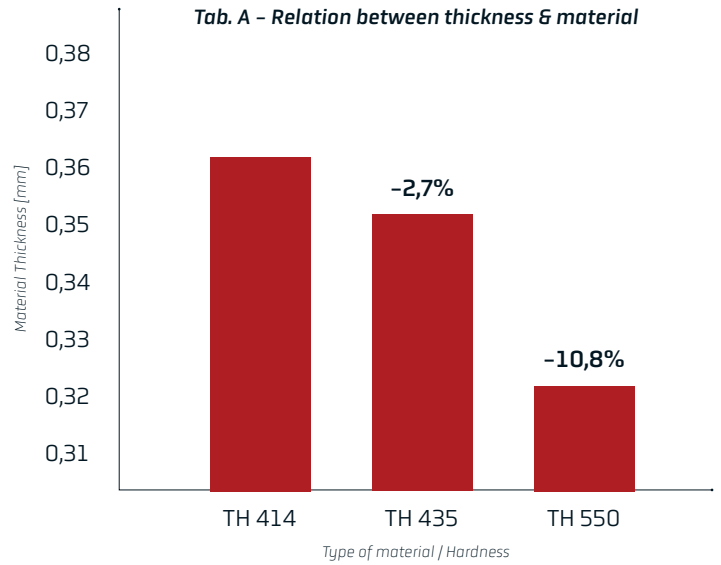


The innovative equipment of INVERNIZZI PRESSE allows to lower the costs for production of aerosol domes and spray cans. Our machines are designed to work harder materials (from TH4335 to TH550) **with or without coating** that, in comparison with the standard ones used for the production of similar pieces, allows to obtain a finished product using a tinner plate, so literally employing less raw material.

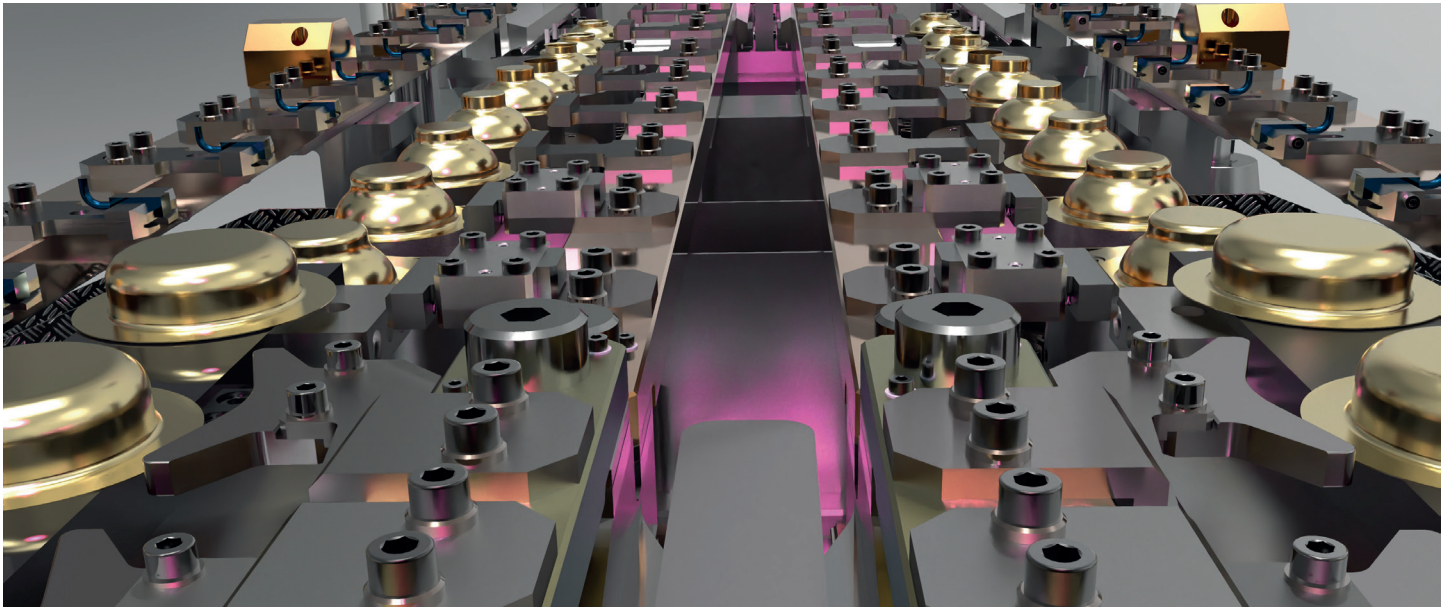
Thanks to this innovative system, our clients have an obvious **advantage on the economic aspect**, but it doesn't stop there, the benefits are **also on an environmental view**; in this transfer systems there are some operations that create and usually disperse some processing residues or machining dusts in the environment (EX:curling), our machines are equipped with an aspiration system precisely to overcome this. This activity is designed to simplify the proper disposal of this waste parts through channels and magnetic conveyors, collecting them in special tanks.

Our machines are studied and built in such a way to always guarantee the same level of initial performance.

Tab. A (right here) shows the savings generated by the use of different materials and thickness. The graphic takes in consideration tinplate Aerosol domes diameter 60 mm resistant to 18 bar.



This optimization allows the end-users to save about two tons of raw materials out of one million pieces produced.



OUR OWN TECHNOLOGY

The technical staff of Invernizzi Presse has more than 65 years of experience to design and realize complete Turn-Key System to produce automatically a wide range of metal parts. In particular, one of Invernizzi Presse's specializations is related to the production of Aerosol domes lines.

BENEFITS OF OUR EXCLUSIVE TECHNOLOGY

The biggest players in the market keep on choosing our technology.





+ PRODUCTIVITY

The largest output available on the market through a innovative process. High volume production of aerosol domes on single or double row.

- PRODUCTION TIMES

High-speed dynamically balanced transfer press with the options of feeding from both cup and strip (Primer), provides the highest level of output available on the market, optimizing operating costs, with reduced levels of scrap material.

+ RELIABILITY

Our manufacturing system incorporates a combination of a precision die and a top quality press, both manufactured in Italy. Most of our system are built according to individual customer specifications.

+ ENERGY EFFICIENCY

Achieved by producing the aerosol domes in this innovative method, generating an impact not only on the economic aspect (less raw material) but also in environmental terms by reducing emissions to the atmosphere.

AEROSOL ENDS

DMT – AD INVERNIZZI PRESSE AEROSOL DOME MANUFACTURING LINES MAIN FEATURES

- High volume production of aerosol dome production with 1 or 2 pieces at stroke.
- The press and transfer tool sets are studied according to the last aerosol markets needing in term of material hardness. The project foresees material hardness TH435 and TH550, T5 tinplate for material saving.
- Dynamically balanced high speed transfer press.
- Press accuracy (using pre-charged roller ram guides, bearing guided, tool columns etc.) and frame rigidity guaranties the max reliability for the repeatability of the stamping conditions.
- Mechanical reduction gear to allow press to supply the nominal energy even at a low number of strokes/min. Special drive unit of new design consisting of 3 thrust planetary gears. The extremely low moment of inertia of the thrust unit ensures highly reduced breaking angle.
- Special hydraulic unlocking system for fast and safe release of the ram in case of tool stuck at BDC.
- High efficiency with proven overall efficiency factor of 95%.
- Tool active parts carbide.
- Simple tool setting guarantees a continue and uniform stamping quality, nor tool adjustment required during the production.
- Rapid production exchange system.
- Complete finished tops production ready for lining.
- Feeding device designed to prevent scratching of pre draw shell (cups) or scroll/strip.

T60 DMT2 – AD FED FROM 90° P&P STRIP/SCROLL FEEDER ZIG ZAG 1 OUTPUT

Aerosol Top Manufacturing Line able to reach 180 pieces/minute.

600 kN transfer press 9 stations dynamically balanced high speed press.

- 90° P&P STRIP/SCROLL FEEDER ZIG ZAG push & pull technology guaranties a high equipment performance in term of productivity and production exchange.
- Single row mechanical transfer.

T80 DMT2 – AD FED FROM PRE DRAW SHELL (CUP)

Aerosol Top Manufacturing Line able to reach 400 pieces/minute.

- 800 kN transfer press 9 + 9 stations dynamically balanced high speed press.
- Fed from pre draw shell (cup).
- 2 output and double row mechanical transfer.
- Double pre draw shell (cup) feeder integrated into the press.

T90 DMT3 – AD FED FROM 90° P&P STRIP/SCROLL FEEDER

Aerosol Top Manufacturing Line able to reach 360 pieces/minute.

- 700 kN transfer press 9 + 9 stations dynamically balanced high speed press.
- 200 kN Blank & Cup external press 1 + 1 station.
- 2 output and double row mechanical transfer.
- Double ram.
- 90° P&P STRIP/SCROLL FEEDER push & pull technology guaranties a high equipment performance in term of productivity and production exchange.

- WASTES

Our sophisticated cup blanking system ensure material optimization by exploiting the full feed strip minimizing material waste to the necessary minimum.

+ INNOVATION

The revolutionary Invernizzi Presse design sets a new standard for aerosol domes production. innovation combined with italian engineering quality leads to the most productive system.



START YOUR REVOLUTION

T60 DMT2 AD FED FROM 90° P&P STRIP/SCROLL FEEDER ZIG ZAG 1 OUTPUT	capacity - force of main press	kN	600
	nominal force at	l/m	45
	working stations in main ram	N	11
	stations pitch in main ram	mm	135
	adjustable cycles	spm	30-180
	diameter range metric	mm	41-65

T80 DMT2 AD FED FROM PRE DRAW SHELL (CUP) 2 OUTPUTS	capacity - force of main press	kN	800
	nominal force at	l/m	45
	working stations in main ram	Nr.	9+9
	stations pitch in main ram	mm	110
	adjustable cycles	l/m	30-200
	diameter range metric	mm	41-65

T90 DMT3 AD FED FROM 90° P&P STRIP/SCROLL FEEDER 2 OUTPUTS	capacity - force of main press	kN	700
	capacity - force of external blank and cup press	kN	200
	nominal force at	l/m	45
	working stations in main ram	N	9+9
	working stations in external ram	N	1+1
	stations pitch in main ram	mm	110
	adjustable cycles	l/m	30-180
	diameter range metric	mm	41-65



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