

ITALIAN EXCELLENCE



PERFORMANCE  
EVOLUTION  
IN THE ART  
OF MILLING



# OMAS Industries



Founded in 1966

Family owned company based in Padova , Italy

Young dynamic company focus on milling performances

Available on the international market with full line of equipment since 1999.





# Invest in R&D

Our Philosophy is :

***Invest or you will die***

Every year we invest more that  
10% of our turnover **to re-think  
and re design** the existing milling  
machinery and process.

We strongly believe that the  
present technology is not updated

We are the **performance  
evolution in the art of milling!**



# 2015 LEONARDO PROJECT :

**RE-DESING THE ROLLERMILL  
For CEREAL GRINDING A  
MACHINERY DEVELOPED BY  
Mr. FRIEDRICH WEGMANN  
ON 1873 !!!**



# LEONARDO PROJECT FOCUS :

**To improve:**

**A) Milling Performances**

**B) Energy Efficiency**

**C) Easy Installation**

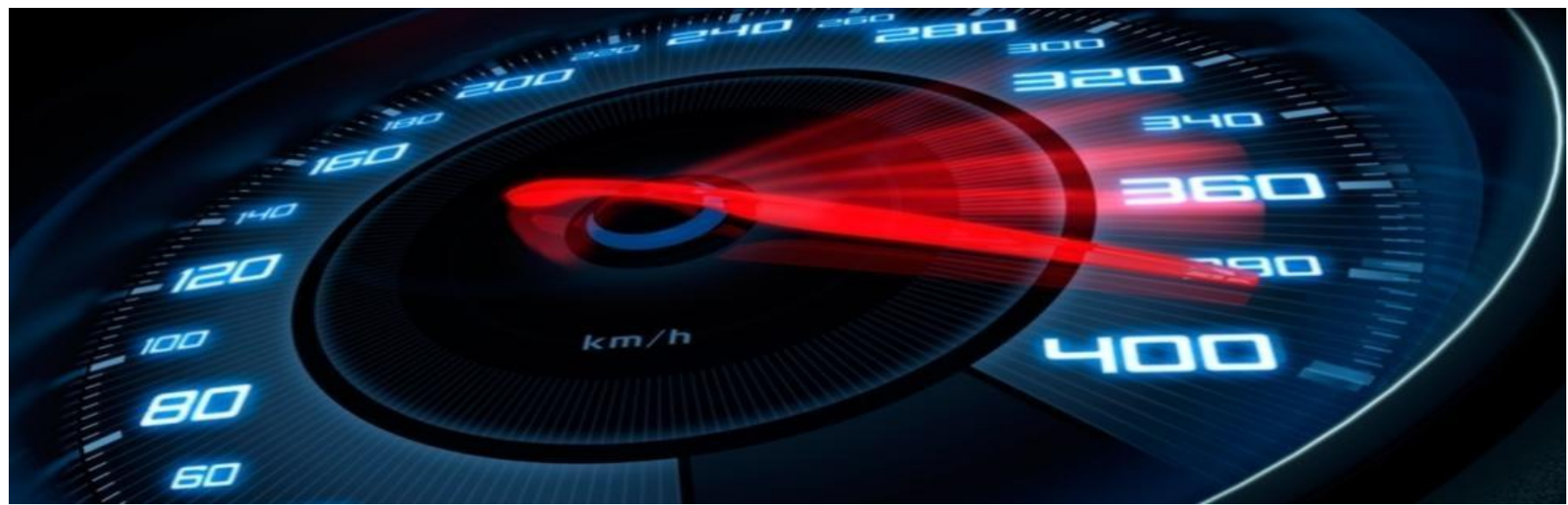
**D) Hygiene & Safety**  
**Easy Maintenance**





# A) LEONARDO MILLING PERFORMANCE, SPEED FLEXIBILITY

**Individual control of the roll Speed (100-600 RPM)  
for the best sharing action on each mill passage to  
increase flour extraction (plus 1%)**



# A) LEONARDO MILLING FLEXIBILITY

Differential Ratio for different cereal:

Soft 1.25

Hard 1.3

Durum 1.35

Rye 1.45

**Leonardo 1 - 5**



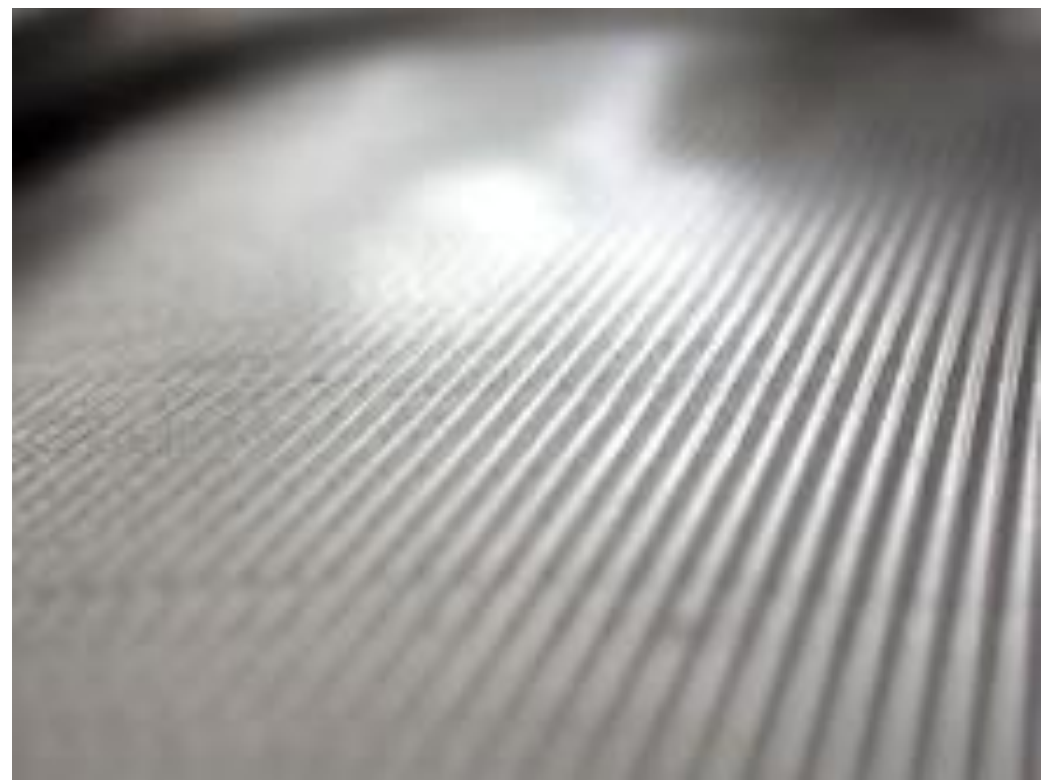
# A) LEONARDO MILLING

## PERFORMANCE UNIQUE FLEXIBILITY

**Sharp to Sharp for the  
Max production of semolina and grits**

**Dull to Dull for the  
Max production of flour**

**Swing mill**





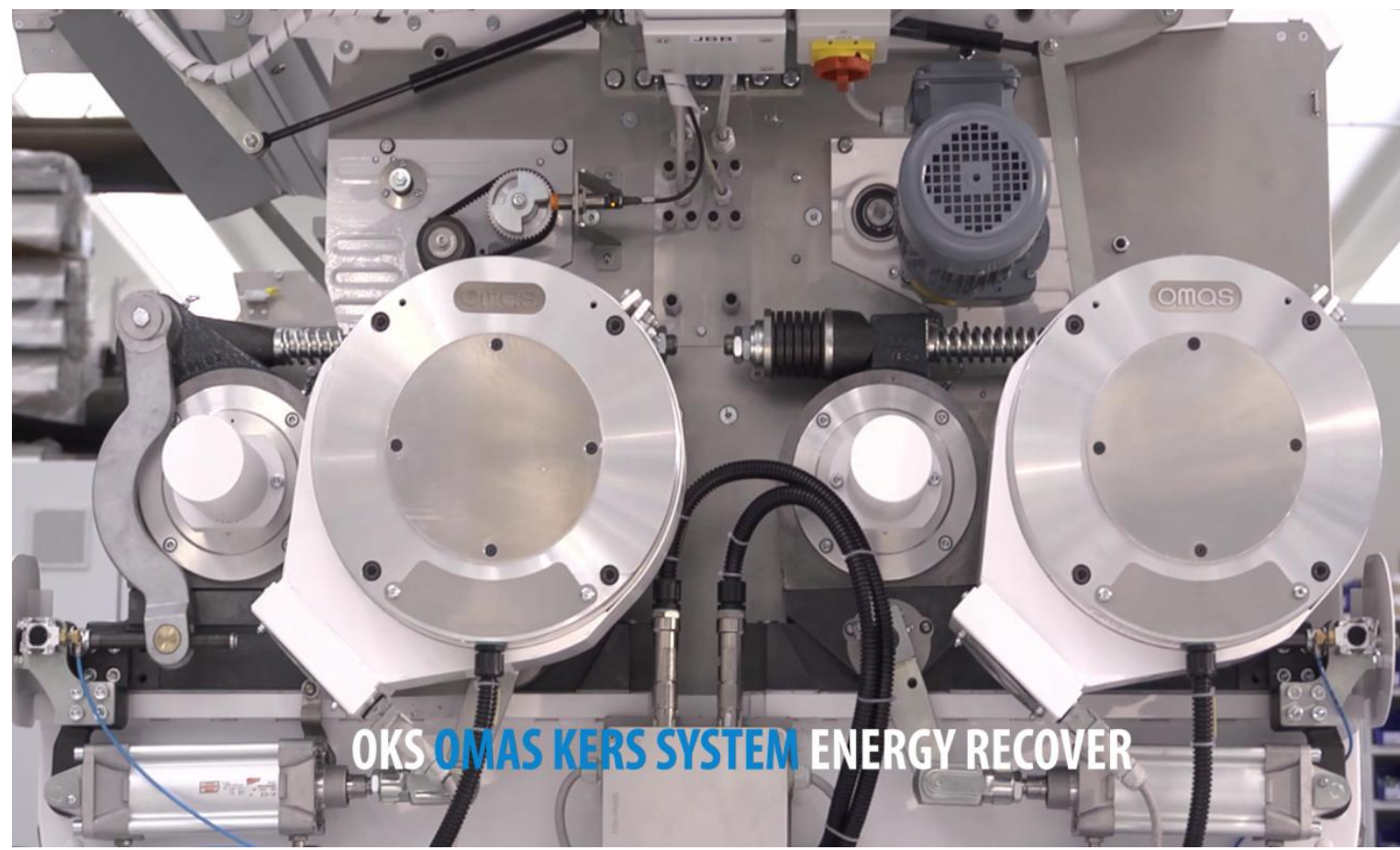
# A) LEONARDO EASE OF MILLING

- Rolls Pressure Reading Device [kg]
- Motor temperature control During normal milling condition
- Alarm for Maximum temperature
- Torque control [Nm]
- Current control [A]



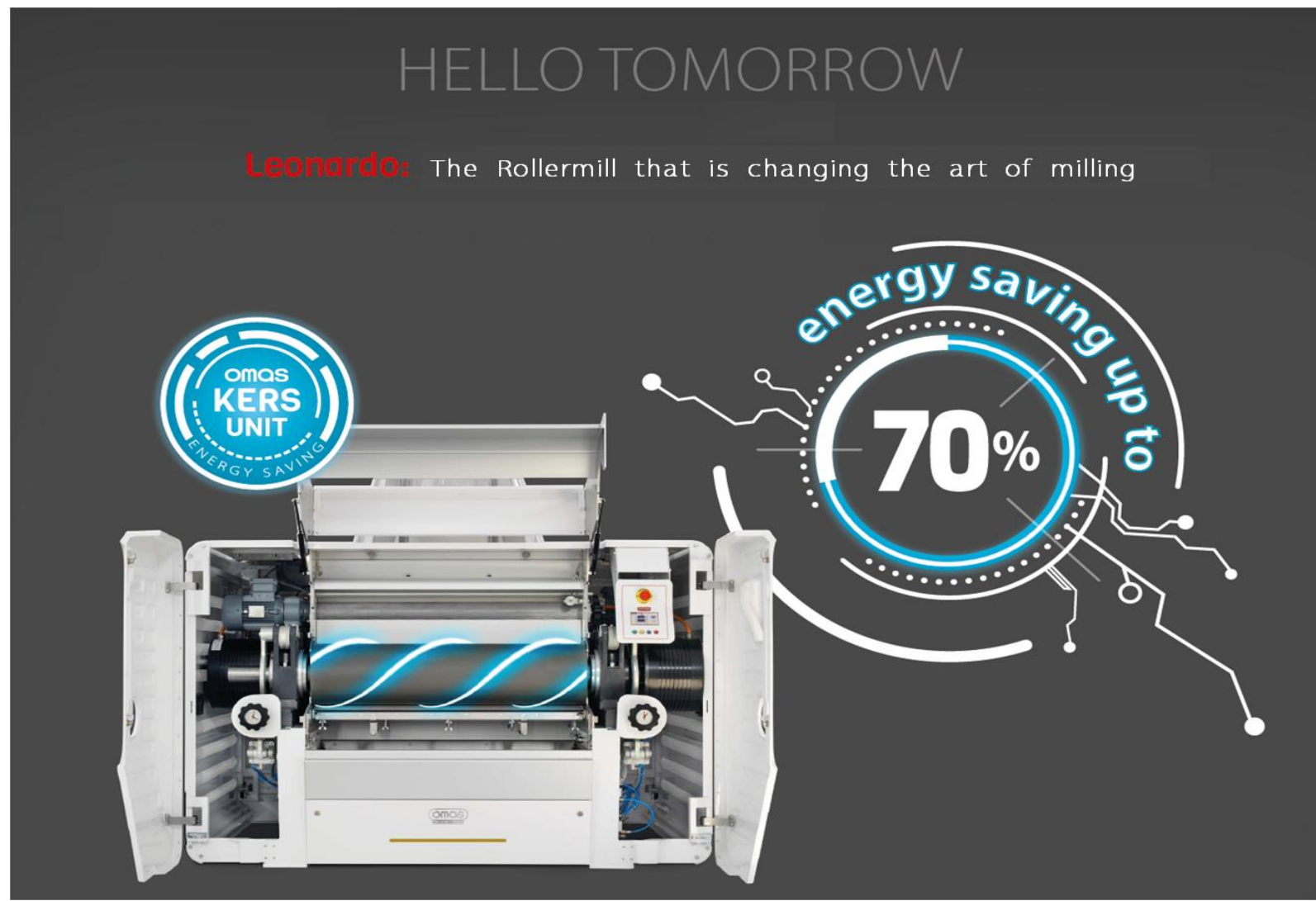
# B) LEONARDO ENERGY REGENERATION

Thanks to World Wide  
Patented:



# A) LEONARDO = ENERGY SAVING

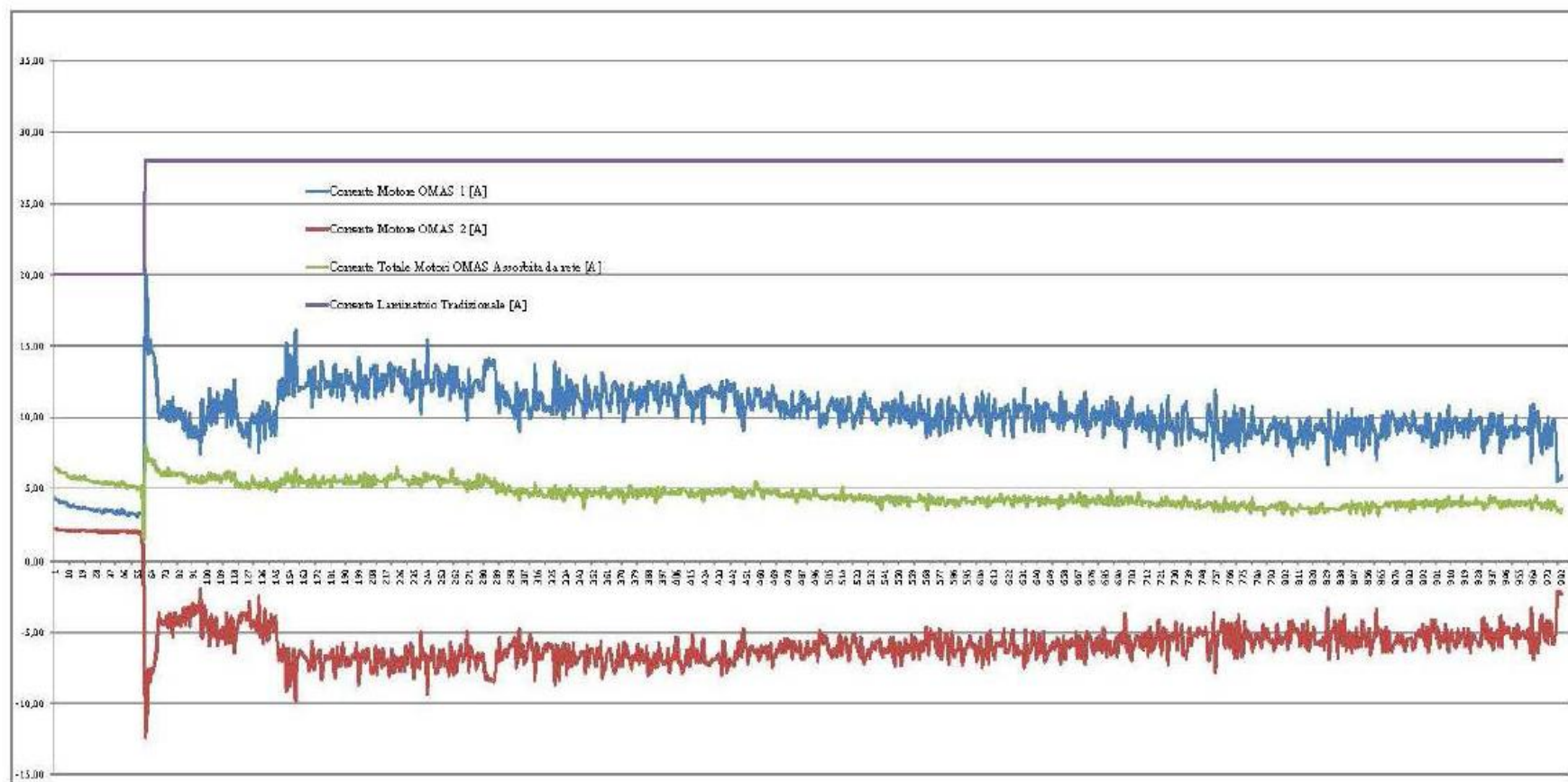
**Leonardo  
save up to 70%  
of electric energy  
compared with a  
conventional belt  
drive Rollermill**





# A) LEONARDO = ENERGY SAVING

Real tests show how Leonardo consume 30% electrical energy compared with conventional machine



# B) LEONARDO = ENERGY SAVING

Comparison:  
Mill plant with Leonardo  
and  
Mill Plant with belt drive  
Rollermill

Plant Cap. 300 T/24H



ROLLERMILLS ENERGY SAVING SIMULATION

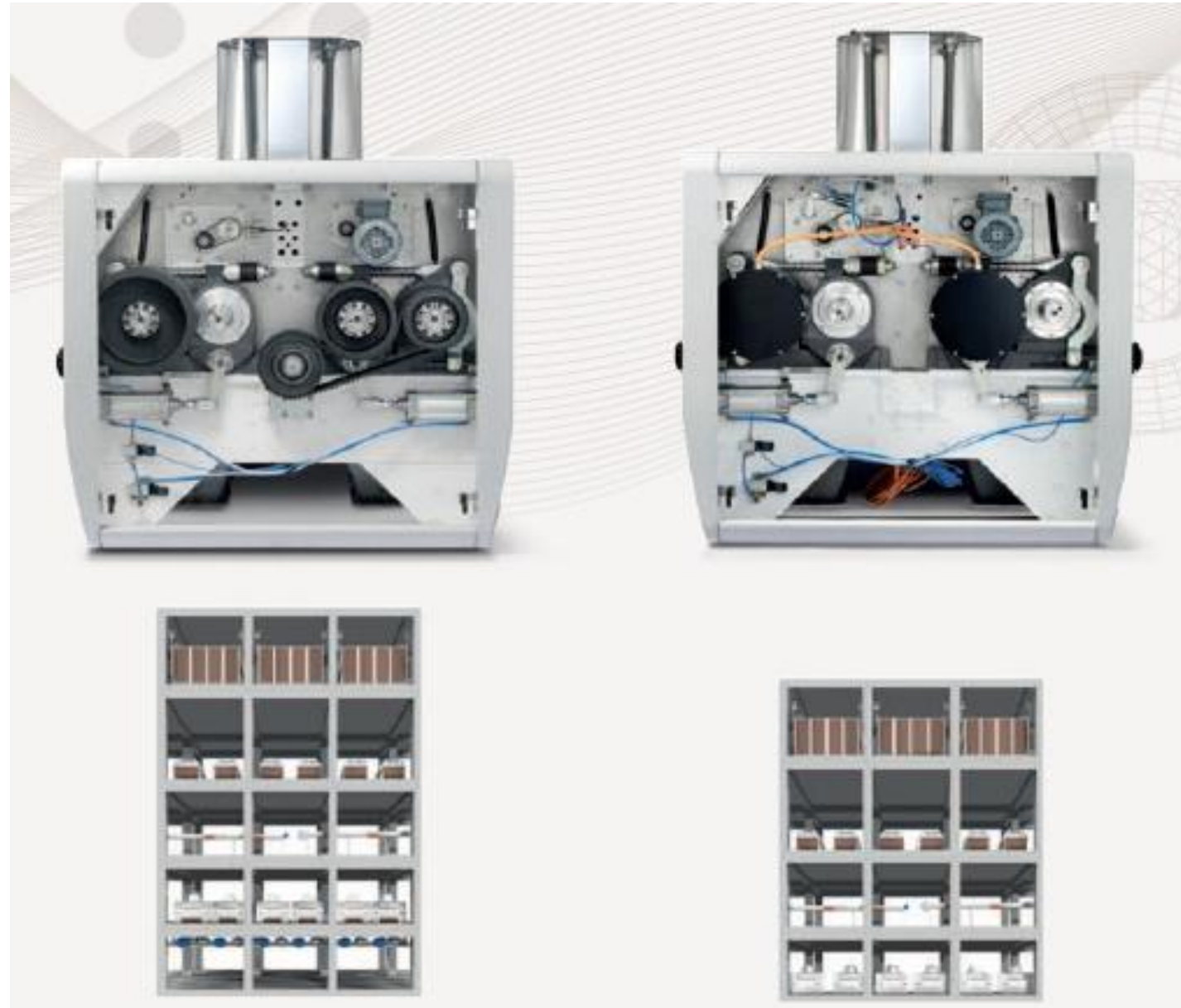
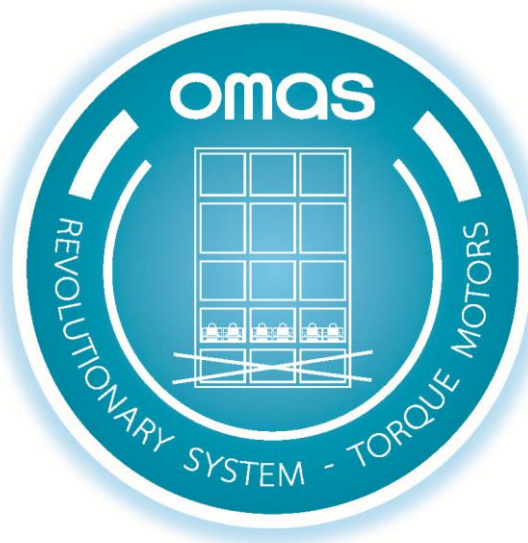
HARD-SOFT WHEAT MILL CAP. 300 TON/24H		CONVENTIONAL			LEONARDO S				
Passage	Rollermill	Installed	Absorbed	Absorbed (*)	MOTOR	Installed	Absorbed (**)	Absorbed	Saving
		[kW]	[Amp]	[kW]	kW	[kW]	[Amp]	[kW]	[%]
B1	1 - 250 x 1250	37	64,00	33,70	20+20	18,00	31,00	16,43	51,24
[2]	1 - 250 x 1250	37	64,00	33,70	20+20	18,00	31,00	16,43	51,24
B2	1 - 250 x 1250	37	64,00	33,70	20+20	18,00	30,00	15,90	52,81
[2]	1 - 250 x 1250	37	64,00	33,70	20+20	18,00	30,00	15,90	52,81
B3G	1 - 250 x 1250	22	38,00	20,01	20+20	18,00	18,00	9,54	52,32
B3F	1 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	15,00	7,95	52,81
B4G	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	1,25	12,50	6,63	51,60
[2]	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
B4F	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	1,25	12,50	6,63	51,60
B5G	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
B5F	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
R1G	1 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	14,00	7,42	55,96
[2]	1 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	14,00	7,42	55,96
R1M	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
[2]	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
R1F	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
[2]	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
R2	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
[2]	1 - 250 x 1250	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
R3	1 - 300 x 1000	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
[2]	1 - 300 x 1000	15	26,00	13,69	12,5+12,5	11,25	12,50	6,63	51,60
R4	1 - 300 x 1000	11	20,00	10,53	5,5+5,5	4,95	8,00	4,24	59,73
C1	1 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	14,50	7,69	54,39
[2]	2 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	14,50	7,69	54,39
C2	5 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	14,00	7,42	55,96
[2]	6 - 250 x 1250	18,5	32,00	16,85	12,5+12,5	11,25	14,00	7,42	55,96
C3	1 - 300 x 1000	15	26,00	13,69	12,5+12,5	11,25	11,50	6,10	55,48
C4	1 - 300 x 1000	15	26,00	13,69	12,5+12,5	11,25	10,50	5,57	59,35
C5	1 - 300 x 1000	11	20,00	10,53	5,5+5,5	4,95	8,60	4,56	56,71
C6	1 - 300 x 1000	11	20,00	10,53	5,5+5,5	4,95	8,00	4,24	59,73
S. TOTAL		557,5	968,00	509,65	783	332,35	449,10	238,02	53,30

COSØ	0,87	0,99	
TOTAL (Considering COSØ)	585,81	240,43	58,96

COUNTRY	EXTIMATE SAVING	PRICE €/Kwh	Daily Working Hours	Annual Working Days	Saving (€)
ITALY	345,38	0,18	24	300	€ 447.612

(\*) COSØ=0.87  
(\*\*) COSØ=0.99

# C) LEONARDO BUILDING ECONOMY





# D) LEONARDO = HYGIENE

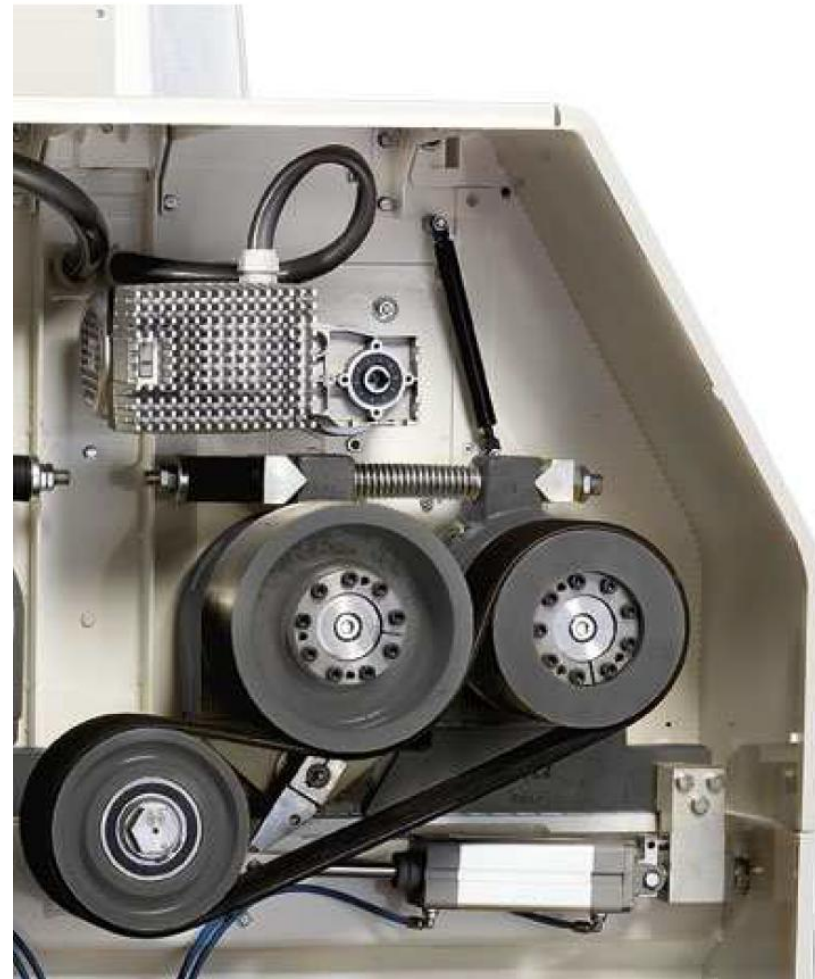


## D) LEONARDO = OPERATOR SAFETY

**Operator can touch every  
parts of the Rollermill  
with no risks while  
functioning**



# D) LEONARDO EASE OF MAINTENANCE





# D) LEONARDO EASE OF MAINTENANCE



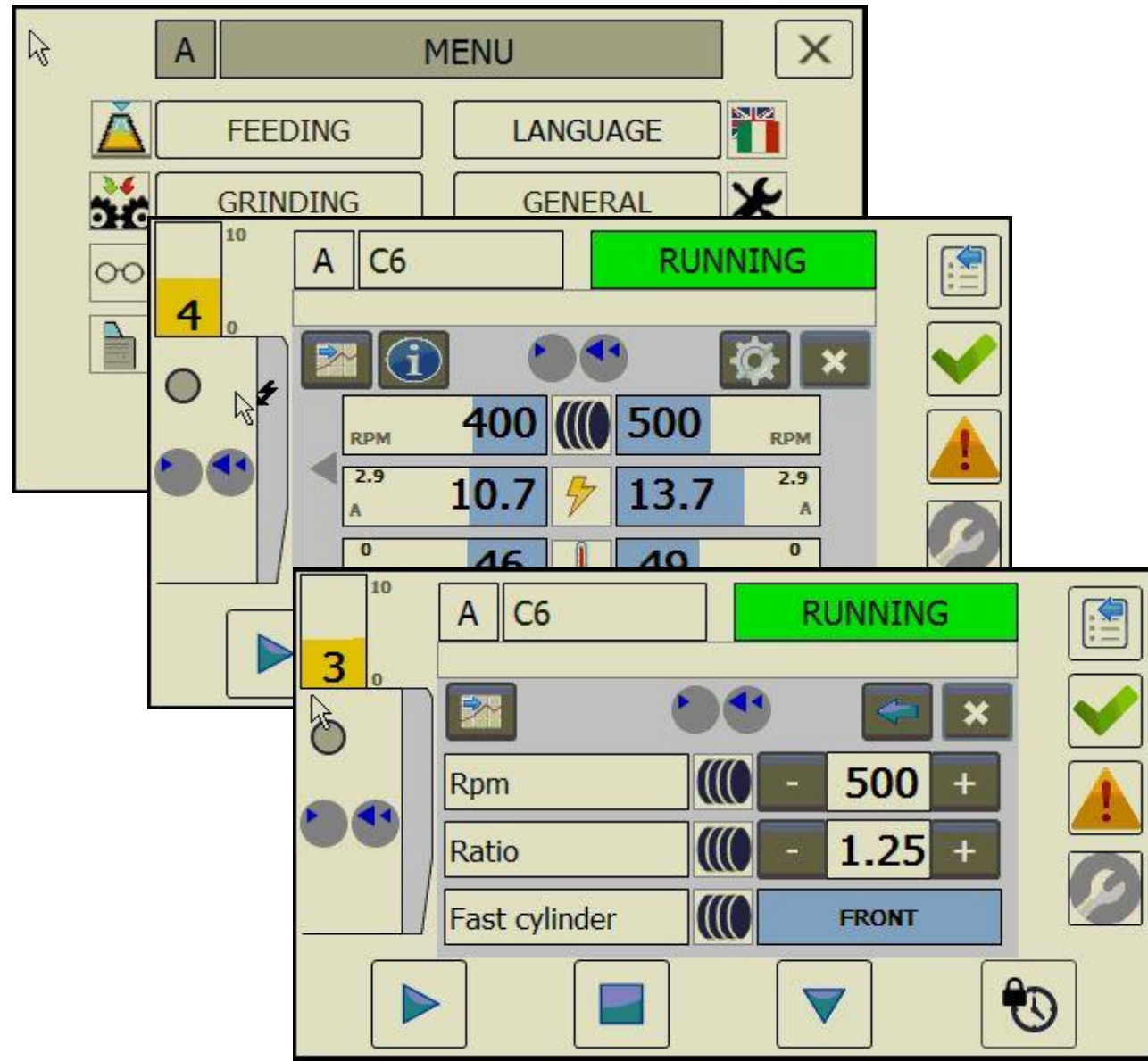
## D) LEONARDO = LOW NOISE LEVEL

- No noise propagation in the mill building
- No Vibration on the mill frame
- A plant with Leonardo installed produces a noise level lower than a plant with conventional rollermills



# LEONARDO = INDUSTRY 4.0

- Leonardo is equipped with a Software that is able to record and save all working parameters to improve the efficiency
- This software comply with:  
Industry 4.0 European  
Norms to allow 250% fiscal  
advantages





# OUR PRESENT IS YOUR FUTURE

