## 

**EFFICIENT MODULAR GRINDING PLANTS FOR A SUSTAINABLE GROWTH** 

**MODULAR** GRINDING SYSTEMS

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## **MODULAR** GRINDING SYSTEMS **WWW.CEMENGAL.COM**

#### **Our Principles**

#### Cemengal, The Alternative

#### **Our Vision:**

To be your Tailor in EPC grinding plants and build with you a lasting relationship based on trust and satisfaction

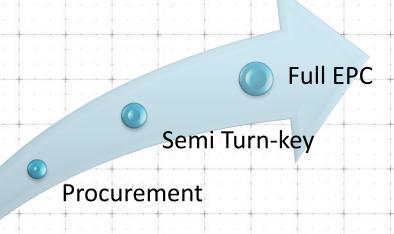
#### **Our Mission:**

To offer customized solutions with the best quality vs. price and to be close to you by satisfying your needs

#### Flexible, tailor made solutions

#### **OPERATING IN THE CEMENT INDUSTRY FOR 30 YEARS:**

Finish Grinding
Fuels Grinding
Grinding circuits Upgrades
Pyro Sections Upgrades
Cement terminals
Plug&Grind™ Systems



Engineering

#### Reliable experience

#### **EPC PROJECTS**

- The vast majority of our projects were on EPC basis
- We do not hide, we assume full responsibility
- If there is a problem, it is OUR problem
- And we work until the problem is solved and the Client is happy

#### **WORLDWIDE OPERATIONS**

- Different Engineering Standards
- Different local conditions
- Different cultures

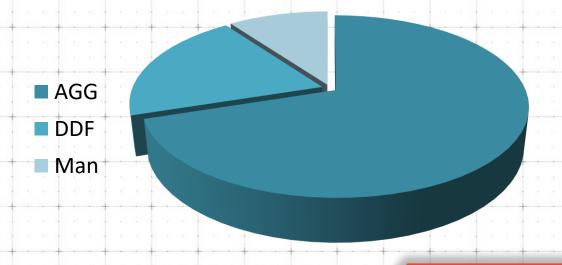
**RELIABLE EXPERIENCE** 

# **Global market** MODULAR GRINDING SYSTEMS **WWW.CEMENGAL.COM**

#### **A Family Company**

#### **FAMILY OWNED LTD. RESP. COMPANY**

The Spanish founder Antonio González Gallego, controls 70% of the shares
The Managing Director Dario del Frate, increased his participation to 20%
Top managers are minority shareholders, with 10% of the shares



#### **Continuous Growth**

**The Madrid Head Office & Workshops** 

2006 = 14 employees

2019 = > 100 employees!!!



Cemengal Asia – Shanghai Office

Commercial & PM Branch

Cemengal Italia - Milan

**Procurement Branch** 

## **CONVENTIONAL PROJECTS** MODULAR GRINDING SYSTEMS **WWW.CEMENGAL.COM**

#### Lafarge, Villasequilla - Spain





2006: EPC line 1, BM building. Storage silos, bulk load & packing. Capacities: 2 x 1.500 t/d

2007: Twin cement grinding plant. Same characteristics as above.

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#### Lafarge - Morocco





2008: EPC Line BK6, 140 t/h BM. Cement Silo 6000m<sup>3</sup> with truck load & packing building. Installation awarded as the most efficient installed in 2008

#### Heidelberg Cement - Belgium





2012: EPC Cement grinding plant BM 110 t/h, 4.350 kW; including 6 x 3.000 Tm storage silos, bulk loading and packing unit.

#### ACICO Cement – Kuwait





2015: Cement Mill 3. Raw material handling, ball mill house with Magotteaux XP4i classifier and silo feeding. Capacity: 3,000 t/d.

#### Cement Australia - Australia





2014: Preassembled cement grinding station with MVR 5.250 kW, 210 t/h OPC. 3 x 200 t/h Ecohoppers; 90.000 Tm fully automated raw material warehouse. 7 x 3000 Tm cement/slag silos.

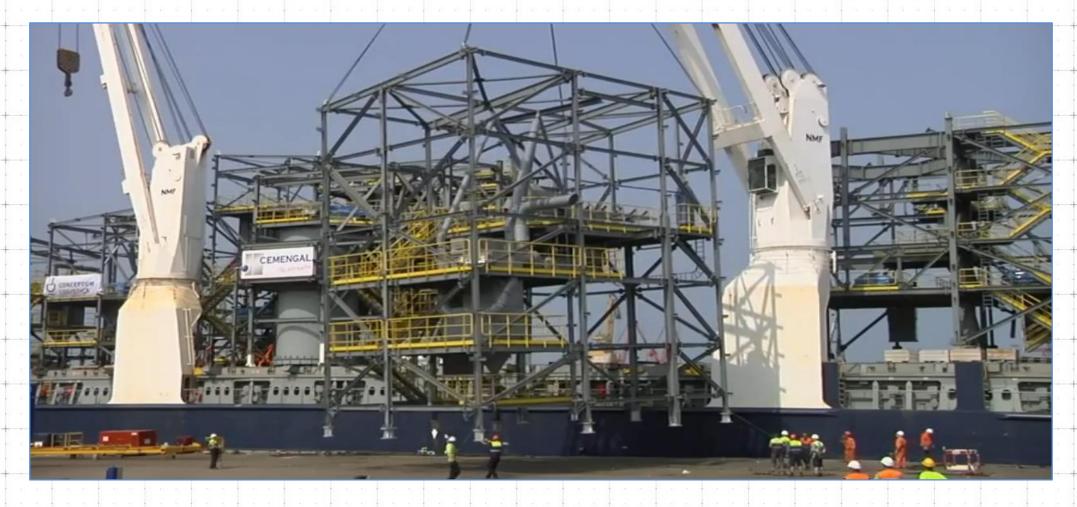
#### 1. THE FIRST MODULAR GRINDING INSTALLATION

Port Kembla, Australia



LOADING OPERATIONS AT GIJON, SPAIN

#### Port Kembla, Australia



UNLOADING OPERATIONS IN PORT KEMBLA, AUSTRALIA

#### Port Kembla, Australia





#### Port Kembla, Australia





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1.2.
ENGINEERING
EFFICIENCY



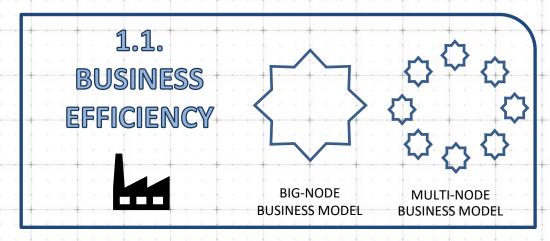
1.4.
OPERATION
EFFICIENCY

**CORP** 





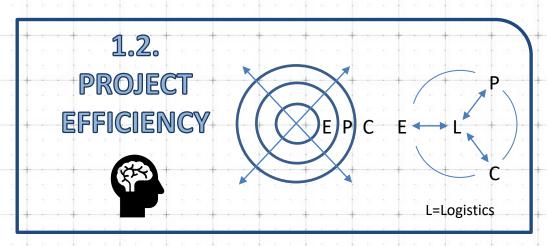






- CAPEX AND FINANCE RISKS REDUCTION.
- SCALING INVESTMENTS TO REAL MARKET DEMAND.
- INMEDIATE PRESENCE IN THE MARKET.







- STANDARD PRODUCT.
- PORTABLE DESIGN: REAL MOBILE ASSET.
- EPC REFROFIT VIRTOUS CIRCLE.



1.3.
CONSTRUCTION
EFFICIENCY









- ON-SITE NON-HEADACHE SOLUTION.
- INNOVATIVE-TRADITIONAL INSTALLATION.









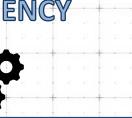


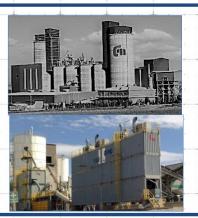






### 1.4. OPERATION EFFICIENCY





- PROVEN TECHNOLOGY.
   REDUCES STRESS. RELEASES ENDORPHINES.
- FIRST INTERNATIONAL SUB-SUPPLIERS.
- EFFICIENT TECHNOLOGY. BM/VRM PORFOLIO.
   PROVIDING CASE BY CASE NEUTRAL ASSESMENT.





#### CEMENGAL – THE WORLDWIDE MODULAR GRINDING EXPERTS

















Capacity	100.000 tpy									
1 <sup>st</sup> Cement	30 weeks									
Units Sold	16									
Units operating	13									

250.000 tpy								+		(6)					
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															1

 400.000 tpy		500.000 tpy
38 weeks		54 weeks
05		01
03		N/A

### PLUG8GRIND®

- > 40 UNITS SOLD.
- > 30 UNITS IN OPERATION.
- > 08 REPEAT CUSTOMERS
- > 06 CEMENT PLANT UPGRADES.

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#### Saudi Ready Mix (I) – Saudi Arabia











#### Kampala Cement (I&II) - Uganda











#### Kampala Cement (I&II) - Uganda





#### Saudi Ready Mix (II) – Saudi Arabia





#### Saudi Ready Mix (II) – Saudi Arabia





#### Ndovu Cement (I) – Kenya











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#### Ndovu Cement (I) – Kenya





#### Cemex - Panamá











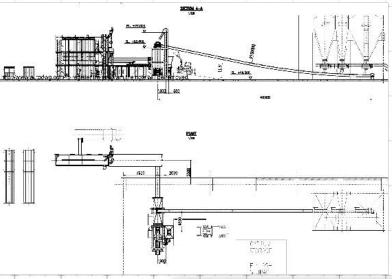
#### Mombasa Cement - Kenya











### Mombasa Cement - Kenya





### Cemento Vallenato - Colombia















Contract signed: 22<sup>nd</sup> Feb 2015



Start up & Commissioning 1st Nov 2015

### Cemento Vallenato - Colombia





### Ciment National – Nouadhibou, Mauritania

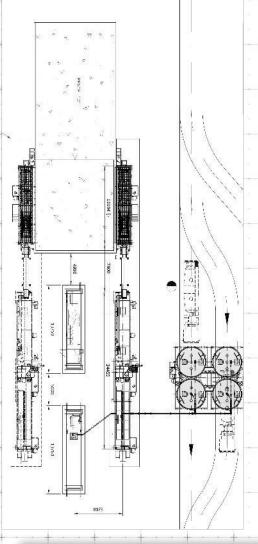












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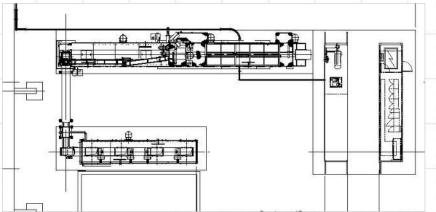
### Lafarge Holcim - Zambia (Plant Upgrade)











### Lafarge Holcim - Zambia (Plant Upgrade)





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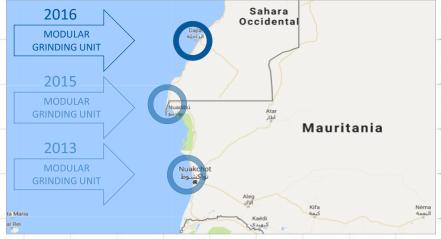
### Ciment National – Nouakchott, Mauritania





### Ciment National - Morocco









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### Cemento Regional - Guatemala





### Cemento Regional - Guatemala

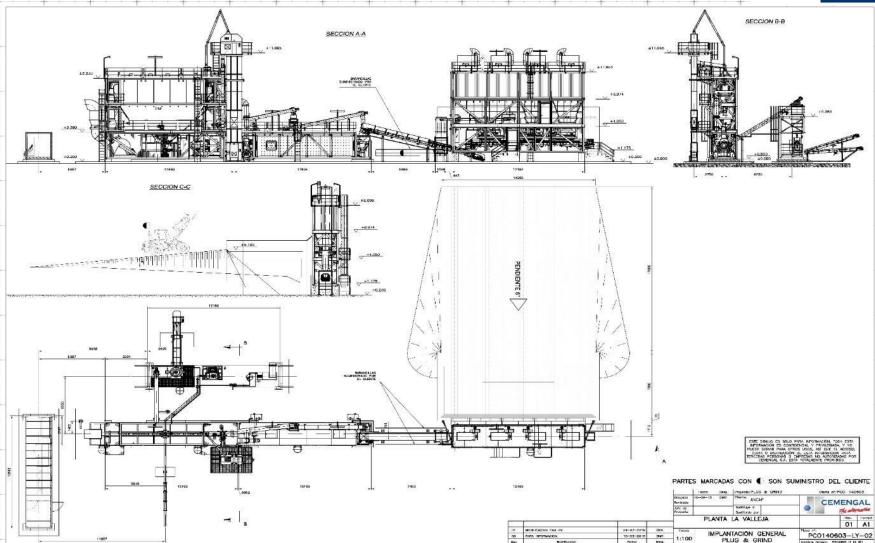




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### Ancap – Uruguay





### Lion Cement - Cameroon









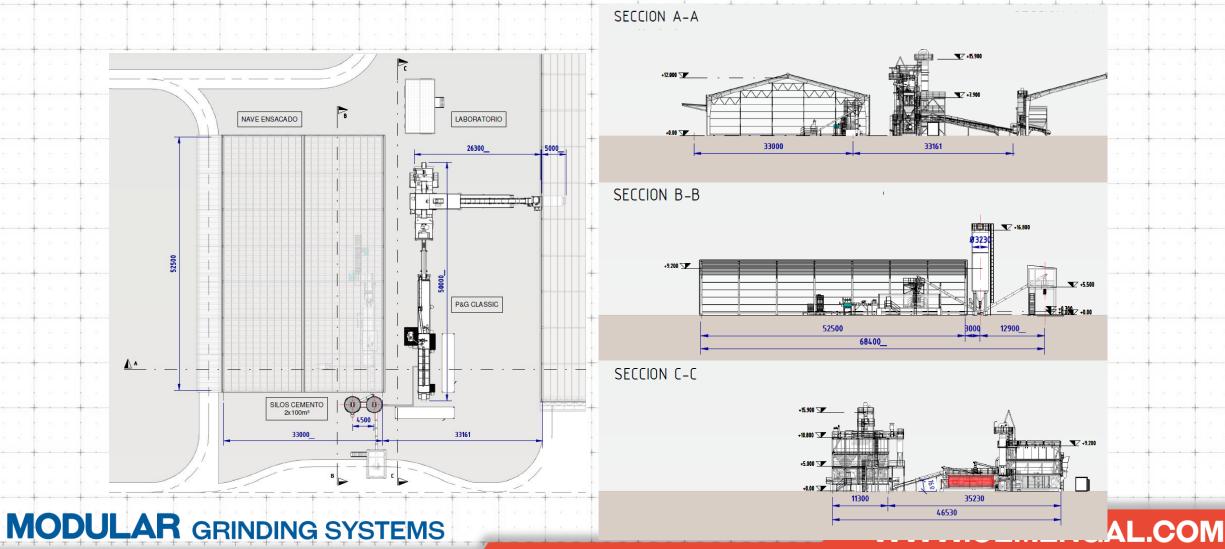
### Lion Cement - Cameroon



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### Cemento Regional – El Salvador (ONGOING)





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### Ciment National – Nouakchott, Mauritania





### Cementos Fortaleza – Mexico Plant Upgrade





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### Cementos Fortaleza – Mexico Plant Upgrade













Contract signed: 01st Jul 2015



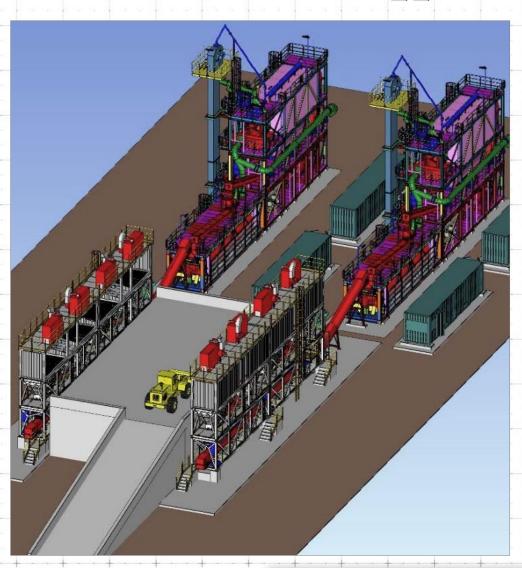
Start up & Commissioning 14<sup>th</sup> Dec 2015

### Cemindo (I&II) – Medan, Indonesia









### Cemindo (I&II) – Medan, Indonesia





### Cemindo (I&II) – Medan, Indonesia





### Cemindo (III) – Benkulu, Indonesia





### Ndovu Cement (II) – Kenya (ONGOING)













### LafargeHolcim – Morocco











### LafargeHolcim – Morocco

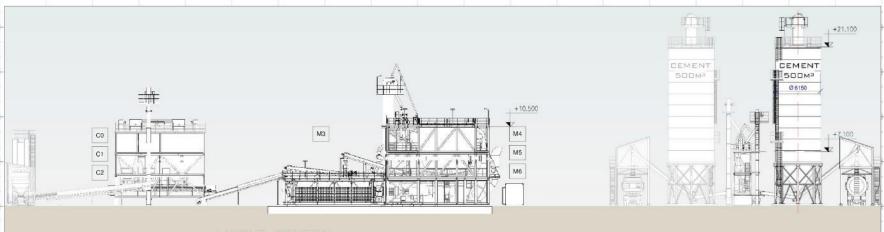




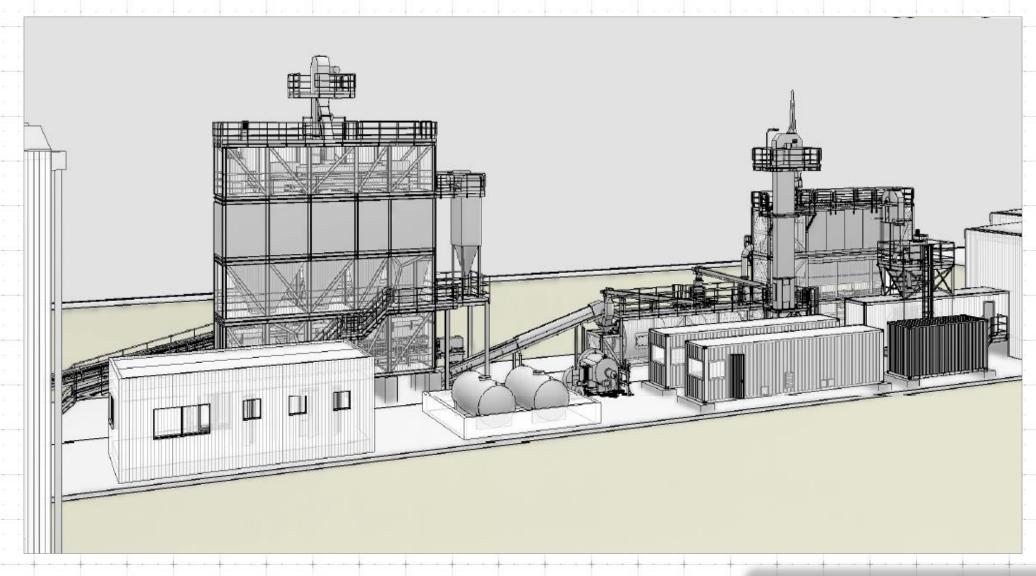
**ONSITE ASSEMBLY DAY 46** 

### Undisclosed Client - Peru (ONGOING)

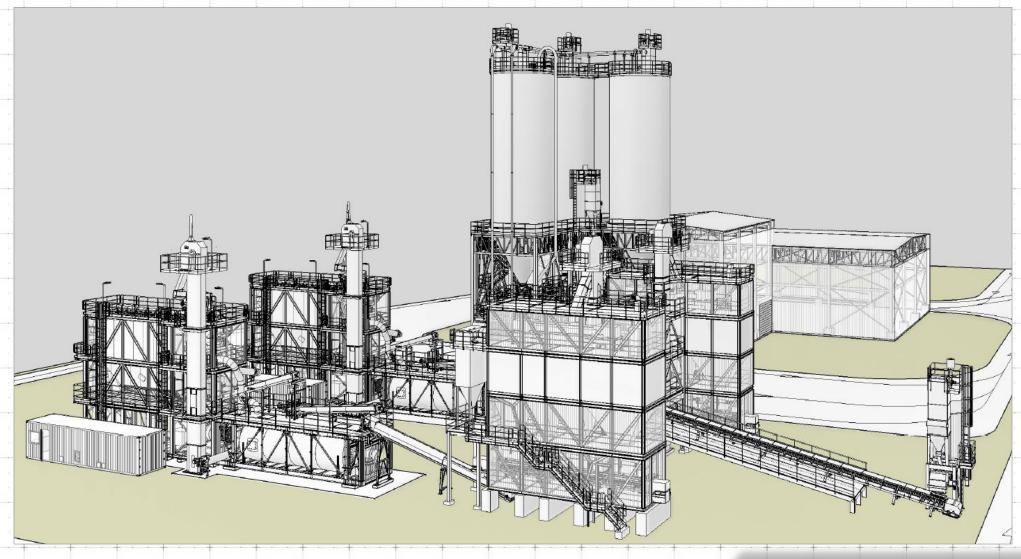




### Undisclosed Client – Central America (ONGOING)

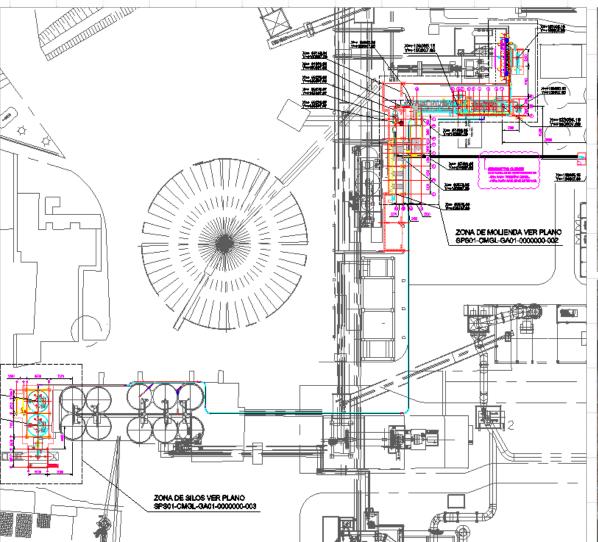


### Undisclosed Client – Central America (ONGOING)



### Cementos del Norte – Honduras Plant Upgrade





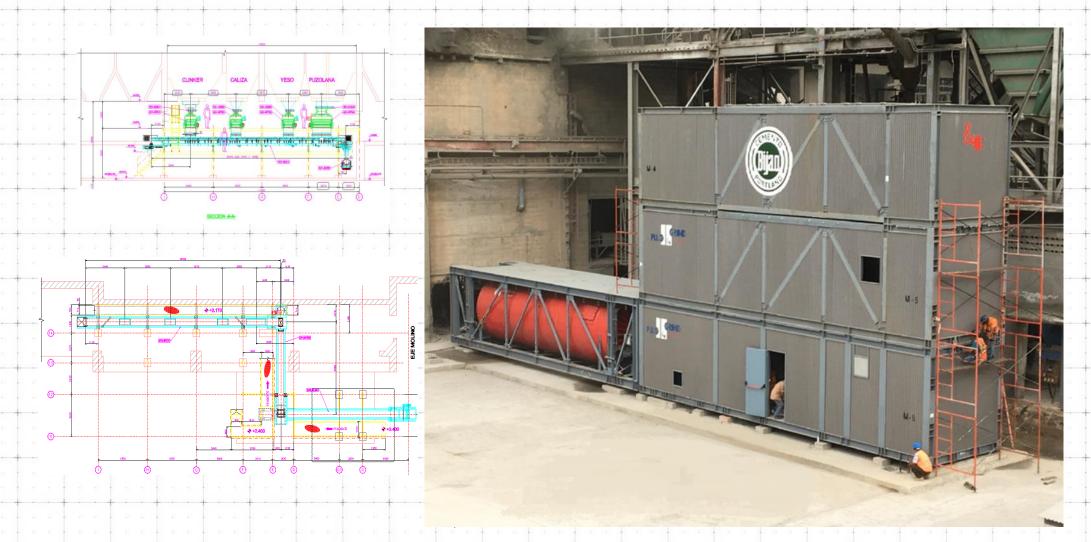




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### Cementos del Norte – Honduras Plant Upgrade





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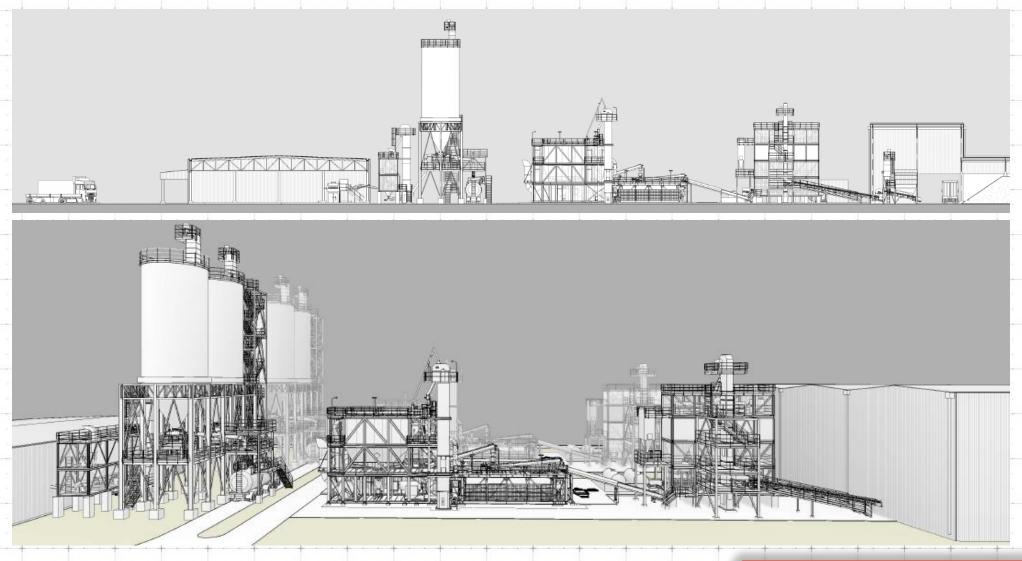
### Cementos del Norte – Honduras Plant Upgrade





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### Undisclosed Client – Central America (ONGOING)

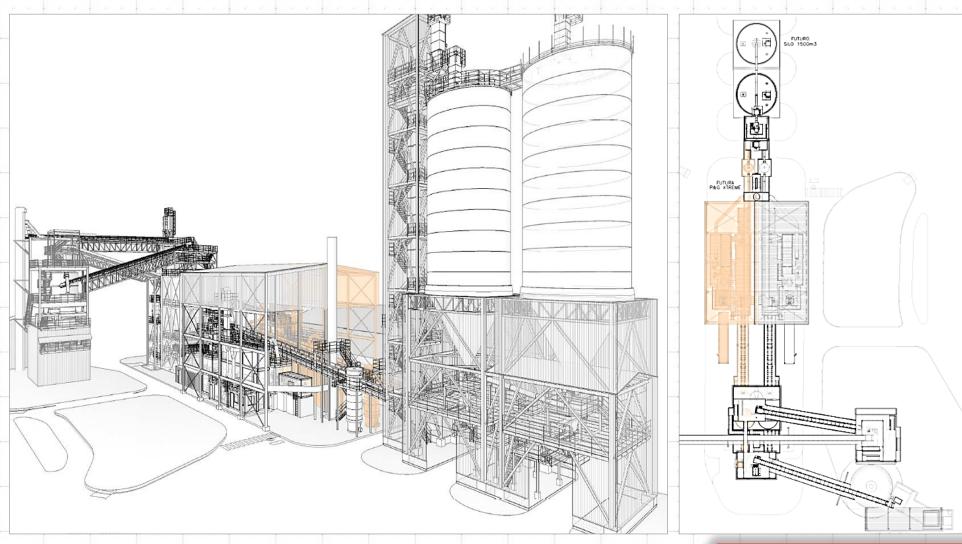


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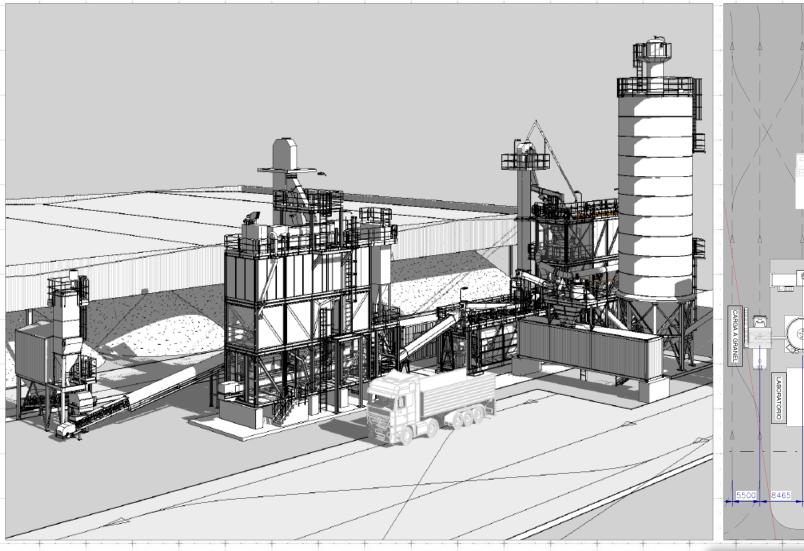
### Cementos Melón - Chile Plant Upgrade (ONGOING)

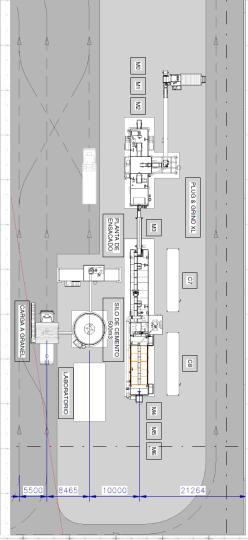




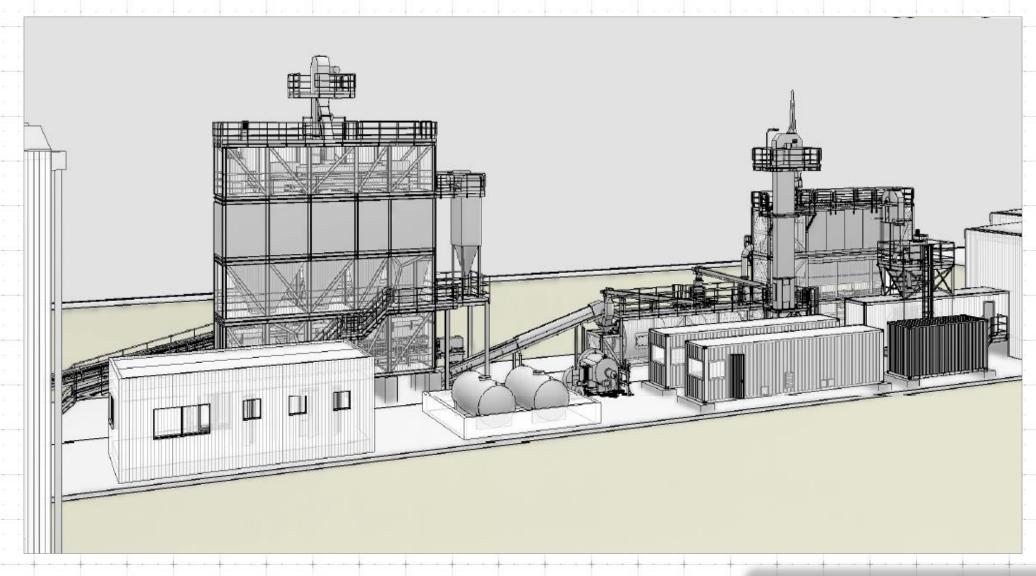
MODULAR GRINDING SYSTEMS

### Undisclosed Client - Chile (ONGOING)



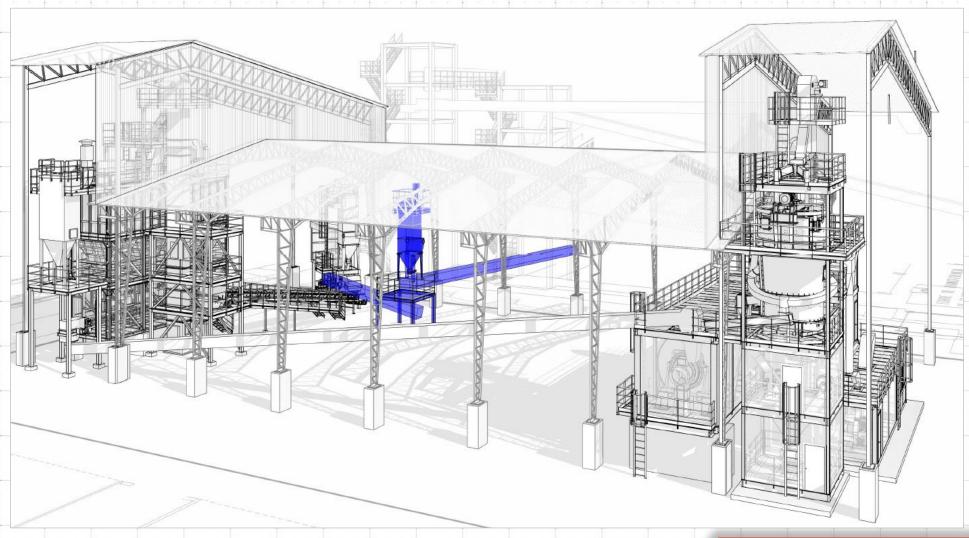


### Undisclosed Client – Central America (ONGOING)



### Unacem – Ecuador Plant Upgrade (ONGOING)





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### CRH – Dunbar Plant Upgrade, UK (ONGOING)







### CRH – Dunbar Plant Upgrade, UK (ONGOING)



- Full EPC Brownfield Project
- First cement: 14 months.
- Scope of supply:
  - ☐ Vertical-Plug&Grind.
    - > 54 mt/h CEM-I @4200 cm<sup>2</sup>/g
    - > 77 mt/h CEM-II @3400 cm<sup>2</sup>/g
  - Automatic interface with existing plant storage (Clinker domo & additives silos)
  - © Cement pneumatic transport to 5 existing silos.
  - New metallic 2,000mt Silo including train bulk loader.
  - Duct circuit interconnexion from existing plant cooler.
  - ☐ Electrical & Control Installation adapted to plant needs.





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