

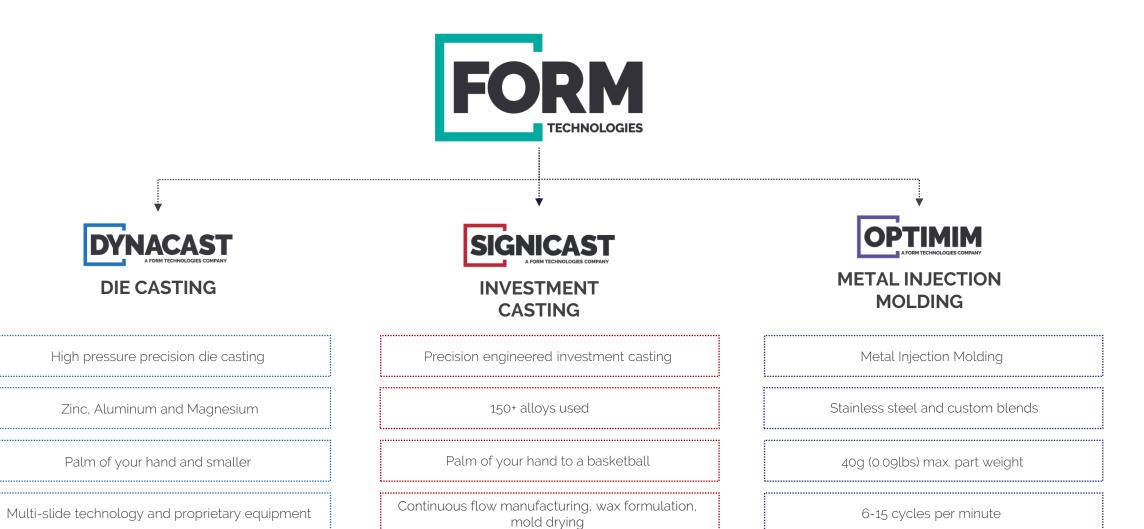
Dynacast Overview



# Precision where it matters most.

Dynacast, a Form Technologies Company, is a leading global manufacturer of small engineered precision components utilizing proprietary multi-slide die casting technology and tooling techniques.







## GLOBAL DYNACAST OVERVIEW



### 21 facilities in 19 countries

Africa, Asia, Europe and North America

### 800+ machines

Ranging from 4T to 580T, A2, A3 and Techmire 4x4, 6x6 and 8x8

### IATF 16949 certified

Full list of certifications here.

## 3 material offerings

Aluminum, magnesium and zinc

## Multiple process capabilities

Hot and cold chamber, multi-slide and injected metal assembly (IMA)

## Secondary operations

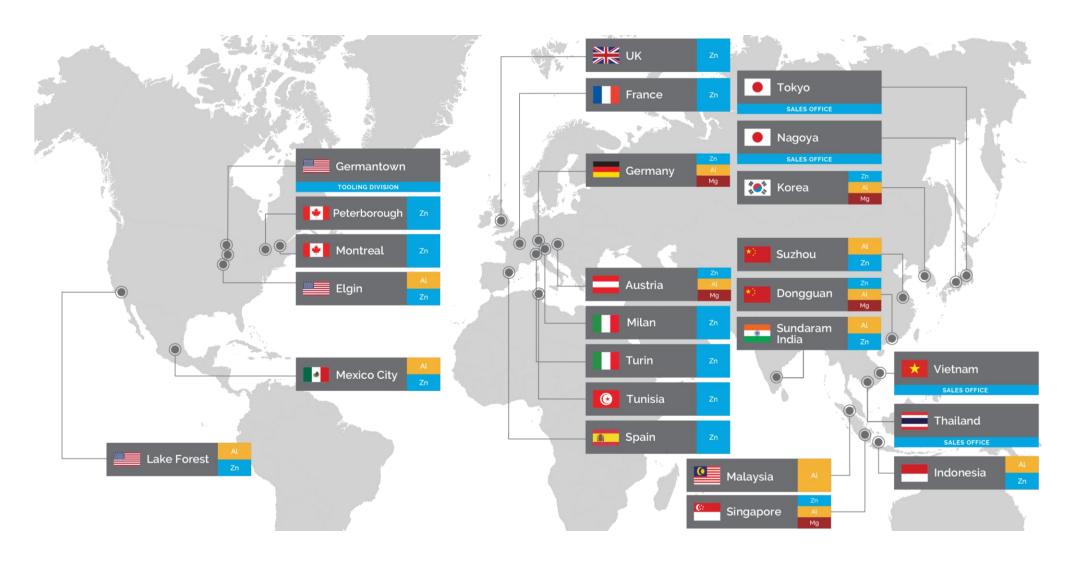
CNC machining, sub-assembly, specialty coatings

## 90+ years of experience

Founded in 1929



#### DYNACAST ALLOYS BY LOCATION





#### ONE STOP SOLUTION



Development of the multi-slide die casting machines.



DFM



Tooling Design, fabrication, modification, and maintenance



Mass Production

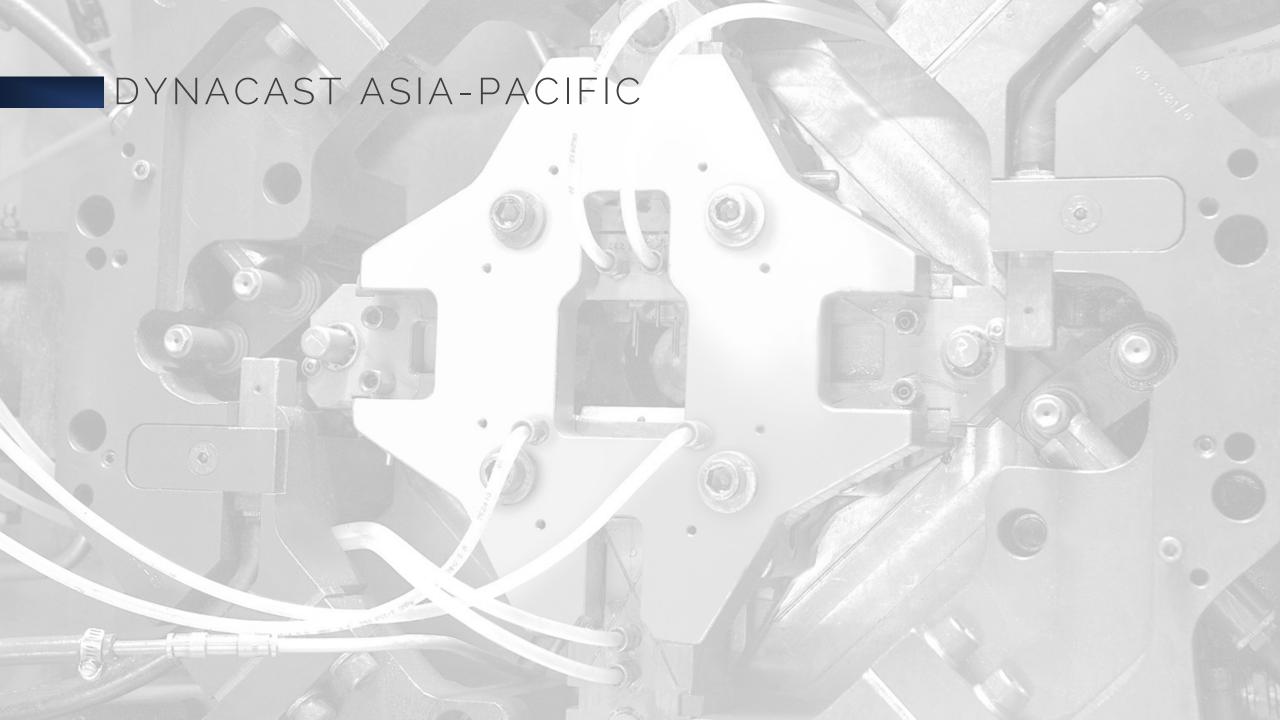


Secondary Operations



Global Presence/Solutions





#### DYNACAST ASIA-PACIFIC



## 7 facilities in 9 countries

China, South Korea, India, Indonesia, Malaysia, Singapore, plus sales offices

## Multiple material capabilities

Aluminum, magnesium and zinc

## IATF 16949 certified

Full list of certifications here.



#### Machines and Certificates

			Dynacast Singapore	Dynacast Malaysia	Dynacast Indonesia	Dynacast Sundaram India	Dynacast Suzhou	Dynacast Dongguan	Dynacast Korea
Facility	Die Casting	ZN multi-slide	32 (A2) 10 (A3)			20 (A2)		15 (A2) 3 (A210) 1 (A3)	8 (A2) 7 (A3)
		ZN Con	1 (125T)		1 (90T) 3 (125T) 1 (200T) 1 (250T)	1 (40T) 5 (63T) 1 (75T)	1 (60T) 4 (80T) 3 (150T) 2 (250T)	3 (60T) 6 (80T) 6 (125T) 2 (250T)	2 (250T)
		Al	2 (135T)	3 (125T) 3 (250T) 10 (350T)	1 (135T) 1 (250T)	3 (125T) 1 (135T) 1 (250T) 5 (350T)	5 (135T) 2 (250T) 31 (350T) 4 (500T)	11 (135T) 9 (350T) 1 (650T+)	4 (125T) 2 (135T) 1 (250T) 1 (350T)
		Mg	1 (A3)					2 (60T) 1 (150T) 5 (350T)	
	Plastic							2 (100T)	
	CNC Machining			22	14		17	113	4
	Turning Machines			4				2	5
Certificates	ISO 9001		Certified	Certified	Certified	Certified	Certified	Certified	Certified
	ISO 14001		Certified				Certified	Certified	
	IATF 16949		Certified	Certified	Certified	Certified	Certified	Certified	Certified
	OHSAS 18001						Certified		



## Suzhou

#### FOOTPRINT

16.262 m<sup>2</sup>

#### EMPLOYEES 700

TOOLING

Maintenance Only



Zamak 2 Zamak 3 Zamak 5 Zamak 7 Zamak 8



ADC1 ADC12 AlSi9Cu3(Fe) AlSi12Cu1(Fe) AlSi12(Fe) A380 ZA-27 K-Alloy DX17, DX21



## 60T (1) 80T (4) 150T (3) 250T (2)

#### CAPABILITIES

- CAD /CAM Systems PRO-ENGINEER
- Magma Mold Flow Simulation Software
- Full range of prototyping capabilities
- In-house maintenance of high precision molds for Zn and Al
- Total Project Management
- Customer education through value engineering & design seminars
- Vacuum washing line w/ robotic arms
- Dust-free room

#### CERTIFICATIONS

- ISO 14001
- OHSAS 18001
- ISO 9001
- IATF 16949

#### SECONDARY OPERATIONS

BARRELING (MECHANICAL AND MAGNETIC) AUTOMATIC BARRELING LEAK TESTING

CRYOGENIC BLASTING AUTOMATIC TAPPING SUB-ASSEMBLY ULTRASONIC WASH

THERMAL DEBURRING SHOT BLASTING CNC MACHINING CENTER (17 BROTHER 4-AXIS)



## Dongguan

#### FOOTPRINT

16,130 m<sup>2</sup>

#### EMPLOYEES 1,225

TOOLING In-house

Zn

Al



Zamak 2
Zamak 3
Zamak 5
Zamak 8
ADC12
ADC10
A380
K-Alloy
AlSi12Cu
DDG1 Alloys
AZ91D

A2 - 10
A3
60T
80T
125T

250T

## 5 60T 150T 350T

#### CAPABILITIES

- CAD /CAM Systems PRO-ENGINEER Mold Flow Simulation Software
- In-house design of high precision tools
- Plastic (100T)
- TPU
- PC
- 60 Machines

#### CERTIFICATIONS

- ISO 14001
- ISO 9001
- IATF 16949

#### SECONDARY OPERATIONS

BARRELING | SUPER BARRELING | DEBURRING | TRIMMING | TAPPING | REAMING

DRILLING | HEAT TREATMENT | SUB-ASSEMBLY | SURFACE FINISHES

THERMAL DEBURRING | SHOT BLASTING | CNC (113) | TURNING MACHINES (2)



## Sundaram

FOOTPRINT

8,200 m<sup>2</sup>

EMPLOYEES

212

TOOLING

CNC EDM, VMC

Zn

Al

Zamak 2 Zamak 3

Zamak 5

ZA 27

ADC6

ADC12

AC4CH

AlSigCu3

LM-24

LM-27

ENAC 47100

ALUMINUM

\_

125T (3)

135T (1)

250T (1)

350T (5)

## A2 (20) 25T (1) 40T (1) 63T (5) 75T (1)

#### CAPABILITIES

- CREO software
- All tool designs are in-house for zinc
- Manufacture close tolerance of 18 micron in as-cast condition using Dynacast multi-slide machines

#### CERTIFICATIONS

- ISO 9001
- IATF 16949

#### SECONDARY OPERATIONS

IN-HOUSE TUMBLING SHOT BLASTING TRIMMING

EXTERNAL VENDOR CNC VMC SURFACE TREATMENT



## Malaysia

FOOTPRINT

12,905 m<sup>2</sup>

**EMPLOYEES** 270

TOOLING MAINTENANCE ONLY



ADC 12 A380 GdAlSi12Cu ZA 27 ENAC 44300 A413

125T (3) 250T (3) 350T (10)

#### CAPABILITIES

- 26 CNC machines
- CNC vertical milling 22 units
- CNC turning 4 units
- Wide range of secondary operations including available in-house and through certified partners

#### CERTIFICATIONS

- IATF 16949
- ISO 9001

#### SECONDARY OPERATIONS

CNC VERTICAL MILLING (22 UNITS) | CNC TURNING (4 UNITS) | SPM MACHINES TUMBLING SHOT BLASTING ASSEMBLY LEAK TEST POWDER COATING LASER ETCH ULTRASONIC WASH. SURFACE FINISHING SPRAY PAINT



## Singapore

FOOTPRINT

11,000 m<sup>2</sup>

EMPLOYEES

240

TOOLING

IN-HOUSE FABRICATION

Zn

Al

Mg

Zamak 3

Zamak 5

Zamak 7

Zamak 8

Beric

EZAC

ADC12

ALSi12Fe

A380

B390

AZ91D

A2 (32)
A3 (10)
125T (1)

**MINUM** 

135T (2)

GNESIUM

A3 (1)

#### CAPABILITIES

- CAD /CAM Systems PRO-ENGINEER
- Mold Flow Simulation Software
- In-house design of high precision tools
- Project management and ESI
- CNC for tooling fabrication only

#### CERTIFICATIONS

- IATF 16949
- ISO 14001
- ISO 9001



## Indonesia

FOOTPRINT

15,100 m<sup>2</sup>

EMPLOYEES 1,700

TOOLING MAINTENANCE ONLY



Zamak 7
Zamak 8
Beric
EZAC
ADC12
ALSi12Fe
A380

B390

 90T (1)
125T (3)
200T (1)
250T (1)

#### CAPABILITIES

- Total of 12 in-house CNC machines
- Wide range of secondary operations available in-house or through certified partners

#### CAPABILITIES

- ISO 9001
- IATF 16949

#### SECONDARY OPERATIONS

TAPPING DRILLING BUFFING VIBRATORY FINISHING PLATING
DEBURRING 100% INSPECTION | SPECIAL SORTING | SUB-ASSEMBLY
POLISHING | CNC | BORE-SIZING | SPRAY PAINTING | SHOT BLAST



