

CAST S.p.A.

Company Presentation



HISTORY FACTS



- 1978** Creation of the company
- 1979** Transfer of the main location to Turin
- 1981** Change of the company type to S.a.s.
- 1983** Creation of the first production plant in Cremella
- 1984** Change of the company type to S.r.l. (Limited)
- 1987** Beginning of export
- 1990** Transfer of the main location to Volpiano (current location)
- 1991** Additional buildings added to the Volpiano location
- 1992** Participation at the first international exhibition (Milano Fluidtrans Compomac)
- 1993** Creation of the production plant in Casalgrasso
- 1994** ISO 9000 certification obtained
- 1995** Widening of the product range to BSI 5200
- 1996** Patent of DIN 2353 cutting ring "B4" is obtained
- 1997** Additional buildings added to the location of Volpiano and Casalgrasso
- 1997** Participation at the first Hannover Messe
- 1998** Widening of the product range to SAE J514 (JIC 37°)
- 1999** Creation of Modena sales branch
- 1999** DVGW product type approval
- 2000** Additional buildings added to the Volpiano location and new offices
- 2001** DNV product type approval for DIN fittings

THE LAST DECADE

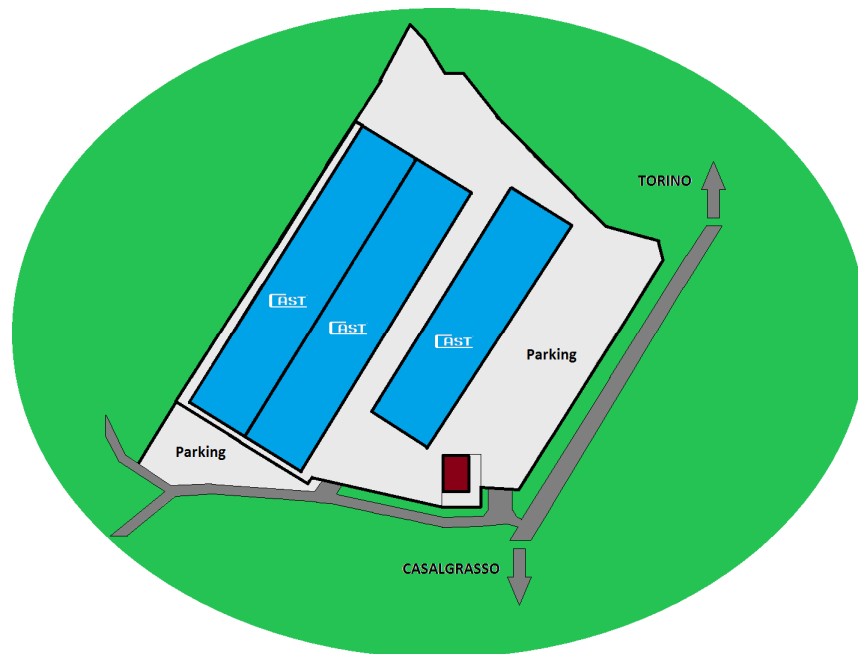


- 2002** RINA product type approval for DIN fittings
- 2002** Widening of the product range to ORFS
- 2003** Creation of Treviso sales branch
- 2003** Export turnover exceeds domestic turnover
- 2004** Doubling of the location of Casalgrasso from 3.500 to 7.000 square meters
- 2004** Widening of the product range to hose fittings
- 2005** DNV product type approval for JIC fittings
- 2005** First semi-automatic assembly machine received
- 2005** Dismissal of Cremella production plant
- 2006** First new-generation production machine received
- 2006** Widening of the product range to rubber and thermoplastic hoses
- 2006** Second semi-automatic assembly machine received
- 2007** Second and third new-generation production machine received
- 2007** Third fully automatic assembly machine received
- 2008** Additional buildings added to the Casalgrasso location (5.000 square meters)
- 2008** Fourth and fifth new-generation production machine received
- 2009** Sixth new-generation production machine received
- 2009** Fourth, fifth and sixth fully automatic assembly machines received
- 2009** DNV product type approval for ORFS fittings
- 2010** Seventh new-generation production machine received
- 2011** Seventh fully automatic assembly machines received

THE STATE OF ART



- Up to date CAST S.p.A. employs about 164 workers
- The total covered surface is over 20,000 square meters
- The 2011 total turnover has been over 37,000,000 Euros (48,000,000 USD)
- Total production potential over 60,000,000 pieces per year
- ISO 9001:2008 certified since 1994
- Full range of DIN 2353, SAE J 514, ORFS, BSI 5200 and Hose fittings both in carbon and stainless steel
- Worldwide export in over 60 different countries



PRODUCTION BUILDING n. 1



The Production Building n. 1 is approximately 3,500 Sq./m

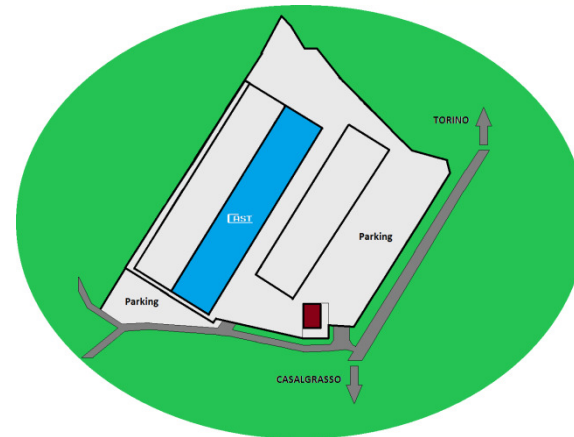
In this building are concentrated all multi-spindle machines as well as CNC production machines. All production machines are equipped with automatic chargers.








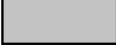


Additionally in this building are located the fitting washing machines, the heat treatment ovens as well as four fitting bending machines two of which are fully automatic.

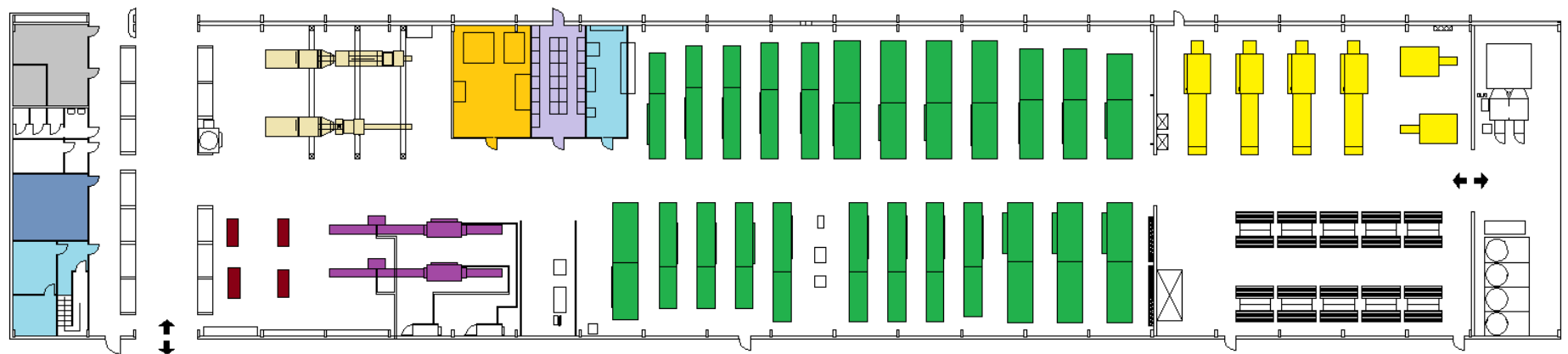
In this building the traditional way of manufacturing is concentrated and handled. The core production is cutting rings, stainless steel as well as straight parts in low and medium production batches.



PRODUCTION BUILDING n. 1



| | | | |
|--|------------------------|---|--------------------------|
|  | Quality control room |  | Heat Treatment Oven |
|  | Maintenance room |  | Fitting Benders |
|  | CNC Machines |  | Fitting washing machines |
|  | Multi-Spindle Machines |  | Production Dept. |
|  | Tool room |  | Technical Dept. |



PRODUCTION BUILDING n. 1



PRODUCTION BUILDING n. 2



The Production Building n. 2 is approximately 3,500 Sq./m

Here a fully automatic convoy sistem recovers all metal scraps from all production machines and concentrates it into a oil-metal centrifuge filter.

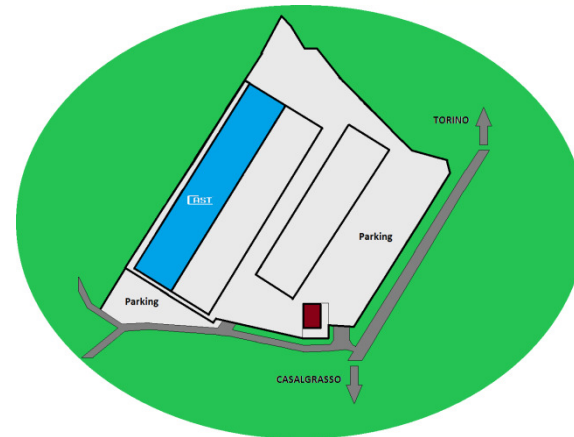
The metal scraps will be picked up by an outer company specialized into recylcing this type of garbage, while the oil will be filtered, chemically treated an reused untill is fully exhausted.






In this building there are concentrated all forging tooling machines as well as the new generation production machines. All production machines are equipped with automatic chargers and numerical controlled spidles.

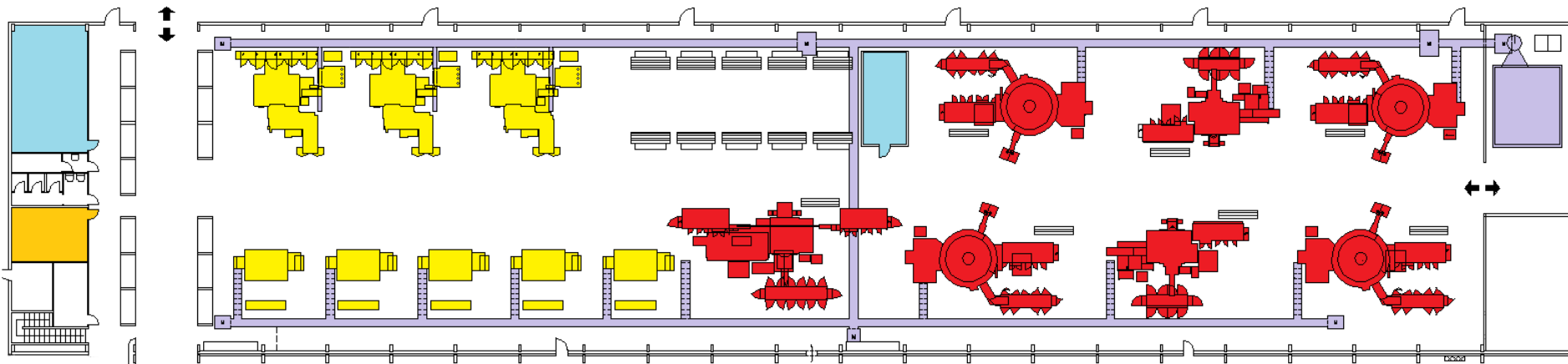
Here are manufactured high and very high volumes production batches.



PRODUCTION BUILDING n. 2



-  Quality control room
-  Maintenance room
-  Forging transfer machines
-  Stragith tranfer machines
-  Metal scraps convoy system



PRODUCTION BUILDING n. 2



ASSEMBLY BUILDING



The Assembly Building is approximately 5,000 Sq./m in two floors.

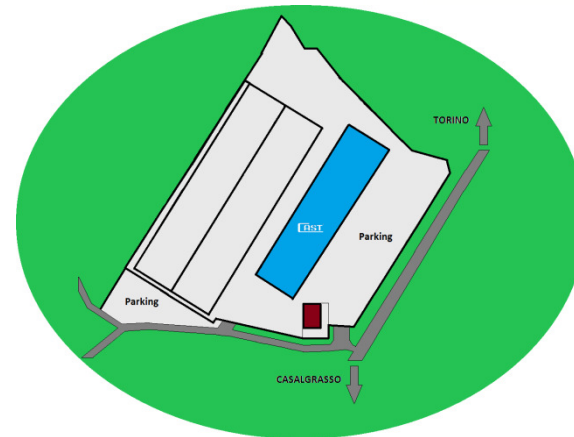
In the underground floor there is the stock of raw steel of bars and forgings, and has a surface of 2,500 sq./m.











The ground floor there is divided in two sections. The first section is the stock of the components used for the assemblies. The second section is filled with the assembly machines which are:

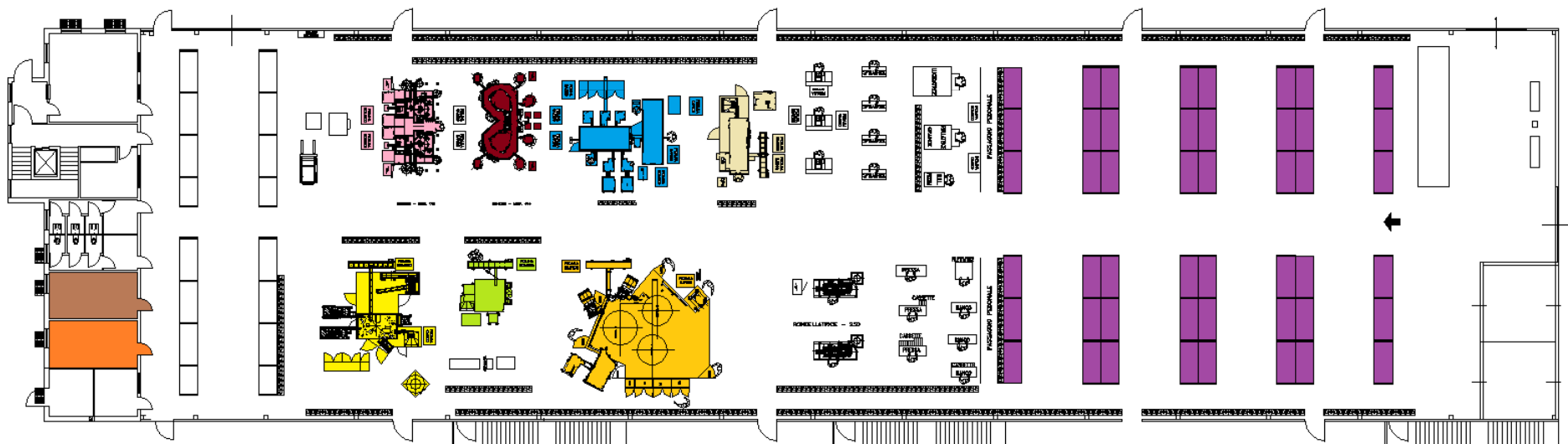
- 1. Fully automatic trust wire swivel nut assembly machine;**
- 2. Fully automatic free nut hose fitting assembly machine;**
- 3. Fully automatic crimped nut fitting assembly machine;**
- 4. Fully automatic steel plug assembly machine;**
- 5. Fully automatic plastic plug assembly machine;**
- 6. Fully automatic adjustable assembly machine;**
- 7. Semi-automatic straight fittings assembly machine #1;**
- 8. Semi-automatic straight fittings assembly machine #2.**

Assembly machines have on board quality controls including thread control, missing component video camera, free drilled hole as well as other checks specifically designed for each specific fitting type.

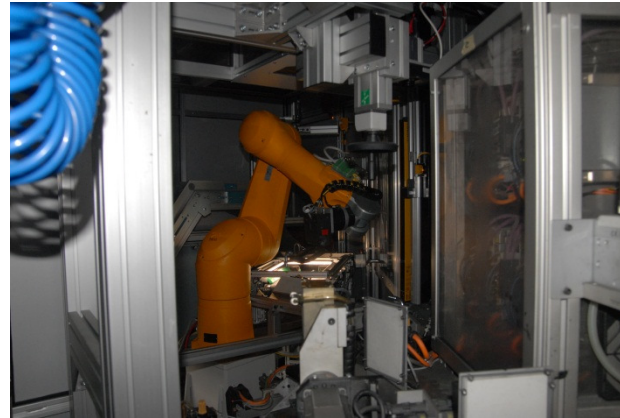
ASSEMBLY BUILDING



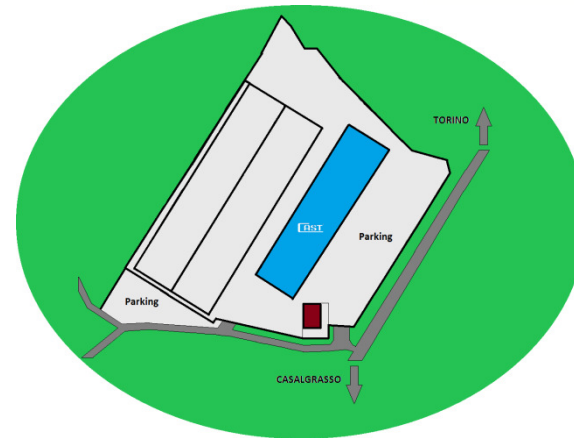
| | | | |
|--|------------------------------|---|--|
|  | Assembly Manager |  | Free nut hose fitting assembly machine |
|  | Health & Safety office |  | Straight fittings machine |
|  | Trustwire swivel nut machine |  | Crimped nut fitting assembly machine |
|  | Steel plug assembly machine |  | Plastic plug assembly machine |
|  | Straight fittings machine |  | Components stock |



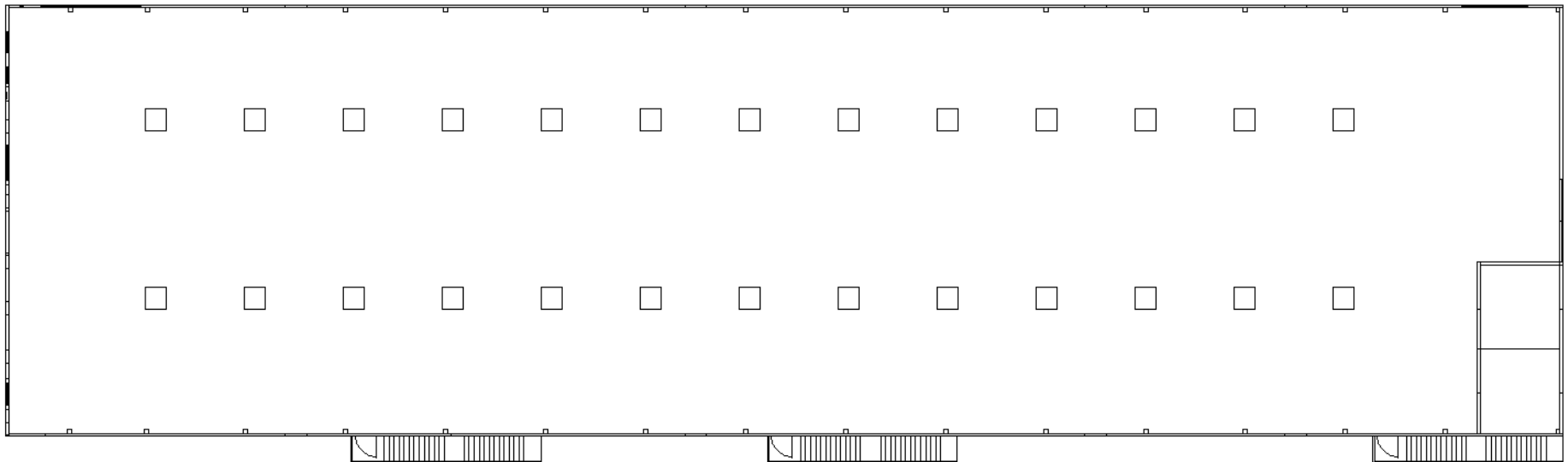
ASSEMBLY BUILDING



ASSEMBLY BUILDING (underground)



Steel, stainless steel bars
and forgings stock



ASSEMBLY BUILDING (underground)





RINA

www.rina.org

CERTIFICATO N.

90/94/S

CERTIFICATE No.

SI CERTIFICA CHE IL SISTEMA DI GESTIONE PER LA QUALITÀ DI
IT IS HEREBY CERTIFIED THAT THE QUALITY MANAGEMENT SYSTEM OF

CAST S.P.A.

STRADA BRANDIZZO 404/408 BIS 10088 VOLPIANO (TO) ITALIA

NELLE SEGUENTI UNITÀ OPERATIVE / IN THE FOLLOWING OPERATIONAL UNITS

STRADA BRANDIZZO 404/408 BIS 10088 VOLPIANO (TO) ITALIA
VIA REG. GAMNA, 3/5 12030 CASALGRASSO (CN) ITALIA

È CONFORME ALLA NORMA / IS IN COMPLIANCE WITH THE STANDARD
ISO 9001:2008

PER I SEGUENTI CAMPI DI ATTIVITÀ / FOR THE FOLLOWING FIELD(S) OF ACTIVITIES

EA-17

PROGETTAZIONE E PRODUZIONE DI RACCORDI PER ALTA PRESSIONE IN ACCIAIO AL CARBONIO ED
INOSSIDABILE AD USO INDUSTRIALE PER TUBAZIONI DA 4 A 42 mm DI DIAMETRO. ASSISTENZA TECNICA

DESIGN AND PRODUCTION OF HIGH PRESSURE FITTINGS IN CARBON AND STAINLESS STEEL FOR INDUSTRIAL
APPLICATIONS FOR PIPING WITH A DIAMETER BETWEEN 4 AND 42 mm. TECHNICAL ASSISTANCE

La validità del presente certificato è subordinata a sorveglianza periodica annuale / semestrale ed a riesame completo del sistema di gestione con periodicità triennale
The validity of this certificate is dependent on an annual / six monthly audit and on a complete review every three years, of the management system
L'uso e la validità del presente certificato sono soggetti al rispetto del documento RINA Regolamento per la Certificazione di Sistemi di Gestione per la Qualità
The use and validity of this certificate are subject to compliance with the RINA document: Rules for the certification of Quality Management Systems

| | |
|-------------------------------------|------------|
| Prima emissione First issue | 28.02.1994 |
| Emissione corrente Current issue | 26.03.2012 |
| Data scadenza Expiry Date | 31.03.2015 |

Dott. Roberto Cavanna
(Managing Director)

RINA Services S.p.A.
Via Corsica 12 - 16128 Genova Italy



ISO 9001:2008 A ISO 9001:2008
ISO 9001:2008 B ISO 9001:2008
ISO 9001:2008 C ISO 9001:2008
ISO 9001:2008 D ISO 9001:2008
Membro degli Accordi di Mutuo
Riconoscimento ISO 9001 e ISO 14001
Signature of EA, IAF and ILAC Mutual
Recognition Agreements

CISQ is a member of



www.iqnet-certification.com

*IQNet, the association of the world's first
class certification bodies, is the largest
provider of management system
Certification in the world.
IQNet is composed of more than 30
bodies and counts over 150 subsidiaries
all over the globe.*

Per informazioni sulla validità
del certificato, visitare il sito
www.rina.org

For information concerning
validity of the certificate, you
can visit the site
www.rina.org

Riferirsi al Manuale della Qualità
per i dettagli delle esclusioni ai
requisiti della norma

Reference is to be made to the
Quality Manual for details
regarding the exemptions from the
requirements of the standard

CISQ è la Federazione Italiana di
Organismi di Certificazione dei
sistemi di gestione aziendale

CISQ is the Italian
Federation of management
system Certification Bodies



www.cisq.com



THE INTERNATIONAL CERTIFICATION NETWORK

CERTIFICATE

**IQNet and its partner
CISQ/RINA**
hereby certify that the organisation

CAST S.P.A.

STRADA BRANDIZZO 404/408 BIS 10088 VOLPIANO (TO) ITALIA
in the following operative units

STRADA BRANDIZZO 404/408 BIS 10088 VOLPIANO (TO) ITALIA
VIA REG. GAMNA, 3/5 12030 CASALGRASSO (CN) ITALIA

for the following field of activities

PRODUCTION OF HIGH PRESSURE FITTINGS IN CARBON AND STAINLESS STEEL FOR INDUSTRIAL APPLICATIONS FOR
PIPING WITH A DIAMETER BETWEEN 4 AND 42 mm. TECHNICAL ASSISTANCE

has implemented and maintains a
Quality Management System
which fulfills the requirements of the following standard

ISO 9001:2008

Registration Number: IT-2631

First Issue: 1994-02-28

René Wasmer

René Wasmer
President of IQNET



Current Issue: 2011-04-07

Gianrenzo Prati

Gianrenzo Prati
President of CISQ

IQNet partners*:

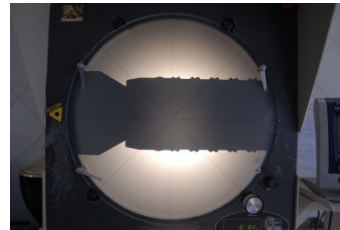
AENOR Spain AFAQ AFNOR France AIB-Vinçotte International Belgium ANCE Mexico APCER Portugal CISQ Italy CQC China
CQM China CQS Czech Republic Cro Cert Croatia DQS Germany DS Denmark ELOT Greece FCAV Brazil
FONDONORMA Venezuela HKQAA Hong Kong China ICONTEC Colombia IMNC Mexico Inspecta Certification Finland
IRAM Argentina JQA Japan KFQ Korea MSZT Hungary Nemko AS Norway NSAI Ireland PCBC Poland QMI Canada
Quality Austria Austria RR Russia SAI Global Australia SII Israel SIQ Slovenia SIRIM QAS International Malaysia
SQS Switzerland SRAC Romania TEST St Petersburg Russia YUQS Serbia

IQNet is represented in the USA by: AFAQ AFNOR, AIB-Vinçotte International, CISQ, DQS, NSAI Inc., QMI and SAI Global

*The list of IQNet partners is valid at the time of issue of this certificate. Updated information is available under www.iqnet-certification.com

ISO 9001:2008

QUALITY CONTROL AND TEST MACHINE



FITTING PASSPORT



We are so confident about our fittings high quality level that we mark each fitting with a specific traceability code which carries the following information:

- Manufacturer's logo
- Year of production
- Manufactured in the EEC (not EC trademark)
- Type of used steel
- Raw steel heat number

Thanks to this sistem, which we believe to be worldwide most advanced and unique, we are able to track each single manufactured fitting up to the detailed 3.1 raw steel certificate, as well as the original production batch including the manufacturing machine, assembly machine, if any, and all the related documents from the steel bar to the customer's shelf.

Besides beeing an ISO norm requisite this grants the final customer a knowledge of the full manufacturing chain in each detail.

This exclusive feature available from CAST S.p.A. has been appreciated by several Worldwide known OEM's such as:



ATLAS COPCO
sweden

Atlas Copco

CAST S.p.A.
Attn: Mr. Alessandro Cosa
Strada Brandizzo 404/408 bis
10088 Volpiano (TO)
Italy

Örebro, 2006-03-10

Dear Mr Cosa,


Qualified manufacturer

We herewith confirm that Cast, S. p. A. is a qualified manufacturer of high pressure fittings used by the divisions of LHD, TME, RTE, SDE, and DC within the company of Atlas Copco Rock Drills AB.

Should you require more information, please do not hesitate to contact our office.

Yours sincerely,

ATLAS COPCO ROCK DRILLS AB


Ronnie Eriksson
Strategic Purchaser

Atlas Copco Rock Drills AB

Atlas Copco Rock Drills AB
SE-701 91 Örebro
Sweden

Visitors address:
Klerkgatan 21
Örebro, Sweden

Phone: +46 (0)19 670 7000
Fax: +46 (0)19 670 7070

Reg. information:
Reg. No./Org. nr 556077-9018
VAT No. SE556077901801
Moms reg. nr 01-556077-9018-01
Reg. office/Ort för styrelse: Örebro

Bank:
Skandinaviska
Enskilda Banken



Since 2005

ARAMCO
UAE

Aramco Overseas Company B.V.
Schuttersveld 14
P.O. Box 222
2300 AE Leiden, The Netherlands

Telephone: +31 (0)71 516 0600
Fax: +31 (0)71 516 0610
K.v.K. LEIDEN No. 28040948
B.T.W. No. NL.00.85.87.899.B01

CAST S.P.A.
Attn: Mr. Alessandro Cosa
404/408 bis Strada Brandizzo
10088 Volpiano (TO)
Italy



Leiden, August 19, 2003

Dear Mr. Cosa,

Re: Company Registration

We herewith confirm that you are registered with Aramco Overseas Company BV and your Vendor ID is **10028738**.

Following material is linked to your ID:

| 9COM | DESCRIPTION |
|------------|------------------------------------|
| 6000000412 | FITTING; HYDRAULIC; ADAPTER; ELBOW |

Should you require any further information, please do not hesitate to contact our office.

Yours truly,

Robert Pieschel
Vendor Liaison Group
Aramco Overseas Company BV
vr293

Since 2003

PALFINGER

Italy

PALFINGER

Palfinger Gru Idrauliche s.r.l.

CAST S.p.A
Att. Mr. Alessandro Cosa
Strada Brandizzo 404/408 bis
10088 VOLPIANO (TO)

Cadelbosco di Sopra (RE), 01.02.2007

Subject: Qualified Supplier

It is our pleasure to confirm that Cast S.p.A is our qualified and rated A supplier in high pressure fittings that are mounted on our cranes produced in Palfinger Gru Idrauliche s.r.l.

We are looking forward to continue excellent cooperation in with you as we believe in your constant improvement in quality of your products and production processes.

Yours sincerely,



Dipl. Ing. Martinovic Dejan
Quality Manager
Palfinger Gru Idrauliche S.r.l.



Since 2007



3.8.2.2 Approved Fluids Supplier Options

| Product Category | Content/Components | Approved Suppliers | Additional Requirements/ Comments |
|------------------|--|---------------------------------------|---|
| Hydraulics | <ul style="list-style-type: none"> - Power Units - Control valves (directional, proportional, servo, pressure, flow) - Check and PO-check valves - Modular stack valves and bolt kits - Sub plates and manifolds - Filters; return-line and pressure-line - Accumulators and lockable safety blocks | Bosch-Rexroth, Parker, Nachi, Vickers | Select (1) Project Book |
| | <ul style="list-style-type: none"> - Cylinders and Actuators | Bosch-Rexroth, Hydro-line, Parker | Not required to select same supplier as Project Book. |
| | <ul style="list-style-type: none"> - Metric steel tube fittings | Parker, Cast | Applies to hydraulics, pneumatics and lubrication |
| Pneumatics | <ul style="list-style-type: none"> - Control valves (directional, proportional, servo, pressure, flow) - In-line valves (manual and mechanical) - Regulators/Filters/ Mufflers/ Silencers - Vacuum pump/ generators - Booster/ intensifiers / reservoirs | Numatics, SMC, Bosch-Rexroth | Select (1) Project Book |
| | <ul style="list-style-type: none"> - Pneumatic Cylinders and Actuators | Numatics, SMC | Not required to select same supplier as Project Book |
| | <ul style="list-style-type: none"> - PO Check Valves | Ross, Ladco | Manual and auto relief feature required |
| | <ul style="list-style-type: none"> - Lockout Valves | Ross | |
| | <ul style="list-style-type: none"> - Metric "push lock" polyurethane tube fittings | Norgren, Bosch-Rexroth | Metal versions only |
| Lubrication | <ul style="list-style-type: none"> - Filters - Single line parallel/series progressive/piston distributor systems - Spindle lubrication - Circulating oil systems - Reservoirs - Electrically driven oil and grease pumps - Float/level/pressure/proximity switches | Trabon, Vogel | Select (1) Project Book |



Certificado de Registro e Classificação Cadastral - CRCC

Emitente
MATERIAIS

No.
027267

Rev.
01

Pág. 002

Data Emissao
10 de Fevereiro de 2012

Data Validade
18 de Setembro de 2012

Fornecedor
HENNINGS VEDAÇÕES HIDRÁULICAS LTDA

**Esta revisão substitui
e cancela as anteriores.**

CNPJ/CPF: 83.748.772/0001-33

Em caso de revenda/distribuição de produtos de origem estrangeira, o pagamento do material estará vinculado à apresentação do comprovante de importação averbado.

Este fornecedor está habilitado a fornecer as seguintes especialidades/materiais:

Atenção! Quando do processo de contratação/compra, a habilitação de cada material deverá ser confirmada no sistema de informação da PETROBRAS (SAP R/3), em decorrência de possíveis alterações na qualificação técnica que possam ocorrer durante a vigência do presente CRCC.

Distribuição de Fabricante: MANULI RUBBER INDUSTRIES S.P.A. (HIDRÁULICA)

CNPJ: Estrangeiro

Famílias de material :

001 - 98.002.122

Manguera montada ;para linha hidráulica ;

Requisitos Técnicos: ISO 9001

Detalhamento:

Diâmetro: 3/4" (máx.)

Comprimento: 7400 mm (máx.)

Tipo de Inspeção : B - Final fábrica com testemunho

Distribuição de Fabricante: CAST SPA

CNPJ: Estrangeiro





Ministero della Difesa

SEGRETARIATO GENERALE DELLA DIFESA E DIREZIONE NAZIONALE DEGLI ARMAMENTI
VI REPARTO - 3° Ufficio

Standardizzazione ed Assicurazione Qualità dei Materiali

MINISTERO DELLA DIFESA
SEGREDIFESA
M_D GSGDNA6 0012186 22-12-2008



PDC: Op.Amm. De Santis Marcella
Via XX Settembre 123/A
00187 - Roma
Tel. 06 4735 4031 - Fax. 06 4735 4706
e-mail: ncbit_help@sgd.difesa.it
sito web: www.codmat.difesa.it

OGGETTO: Codificazione NATO dei materiali. Richiesta pervenuta da: DENMARK.
Contratto SIAC 4PZS083320000036 del 27 novembre 2008.

A: CAST SPA
STRADA BRANDIZZO 404-408 BIS
10088 VOLPIANO (TORINO)

1. Si comunica che l'Ufficio di Codificazione in oggetto ha richiesto di codificare gli articoli in Allegato 1, ascritti a materiale di presunta produzione di codesta Società.
2. Al fine di procedere all'avvio dell'iter codificativo dei suddetti articoli, si prega codesta Ditta di confermare la correttezza dei dati identificativi riportati nella lista allegata, ovvero fornire le eventuali correzioni, con cortese sollecitudine e comunque non oltre il 11 gennaio 2009.
La conferma dei dati potrà essere effettuata via fax direttamente a questo Ufficio o all'indirizzo email di cui sopra riportando il numero di contratto SIAC.
3. Inoltre, nel caso in cui gli articoli risultino effettivamente di vostra produzione e allo scopo di conferire maggiore valenza alla codificazione dei materiali in questione, dovranno essere forniti i dati identificativi (schede CM-03 e GM-02) secondo quanto disposto dalla normativa in vigore, con procedura UCID97 (sia on line sia off line, scaricando la procedura dal sito web di questo Ufficio), entro il 10 febbraio 2009.
4. Quanto sopra potrà facilitare, nell'ambito dell'organizzazione logistica delle Forze Armate nazionali e NATO, eventuali future forniture di codesto materiale.

IL VICE CAPO REPARTO
Dirig. FRAGETTI Dott. Mario





PRODUCT TYPE APPROVALS



Zertifikat über ein DIN-DVGW Prüfzeichen
certificate for a DIN-DVGW test mark

NG-4502AU0117

Registriernummer
registration number

| | |
|---|---|
| Anwendungsbereich <i>field of application</i> | Produkte der Gasversorgung <i>products of gas supply</i> |
| Zertifikatinhaber <i>owner of certificate</i> | CAST S.p.A. Strada Brandizzo 406/408, I-10088 Volpiano (TO) |
| Vertreiber <i>distributor</i> | CAST S.p.A. Strada Brandizzo 406/408, I-10088 Volpiano (TO) |
| Produktart <i>product category</i> | gas pipes and fittings: soluble connection for metal pipes (4502) |
| Produktbezeichnung <i>product description</i> | Separable unthreaded connection for metal pipes |
| Modell <i>model</i> | CAST B3 |
| Bestimmungsländer <i>countries of destination</i> | DE |
| Prüfberichte <i>test reports</i> | type testing: 129063eB1 from 26.01.2004 (GWI) |
| Prüfgrundlagen <i>basis of type examination</i> | DIN 3387-1 (01.01.1991) |
| Ablaufdatum / AZ <i>date of expiry / file no.</i> | 28.02.2009 / 04-0051-GNV |

18.02.2004 Pie A-112

Datum, Bearbeiter, Blatt, Leiter der Zertifizierungsstelle
date, issued by, sheet, head of certification body

DVGW-Zertifizierungsstelle - von der Deutschen Akkreditierungsstelle Technik (DATech) e.V. akkreditiert für die Konformitätsbewertung von Produkten der Gas- und Wasserversorgung

DVGW Certification Body - accredited by Deutsche Akkreditierungsstelle Technik (DATech) e.V. for conformity assessment of products of gas and water supply



DAT-ZE-009/96-11

DVGW Deutsche Vereinigung
des Gas- und Wasserfaches e.V.
Technisch-wissenschaftlicher
Verein

Zertifizierungsstelle
Josef-Wirmer-Straße 1-3
D-53123 Bonn
Telefon +49 (228) 91 88 807
Telefax +49 (228) 91 88 993





Type Approval Certificate

Germanischer Lloyd



This is to certify that the undernoted product(s) has/have been tested in accordance with the relevant requirements of the GL Type Approval System.

Certificate No. 1243810 HH

Company CAST S.p.A.
Strada Brandizzo 404/408
10088 Volpiano, ITALY

Product Description PIPE UNIONS

Type Bite Type Fittings B3
L, H - Series

Environmental Category None

Technical Data /
Range of Application TECHNICAL DATA
Fitting material carbon steel CF9SMnPb36, 11SMnPb37
Metallic sealing with cutting ring type B3

| | | | | |
|--------------------|--------------------------|-------------|--------------|-----------|
| M.A.W.P.: | L-Series | 6 - 18 [mm] | 22 - 42 [mm] | |
| | | 315 [bar] | 160 [bar] | |
| | H-Series | 6 - 14 [mm] | 16 - 30 [mm] | 38 [mm] |
| | | 630 [bar] | 400 [bar] | 315 [bar] |
| Temperature range: | -20 [°C] up to 120 [°C] | | | |
| Size Range: | 6 - 42 [mm] for L-Series | | | |
| | 6 - 38 [mm] for H-Series | | | |

RANGE OF APPLICATION

The above mentioned pipe unions of bite type with cutting ring B3 are type approved as compression couplings for the use in piping systems according to the Rules I-1-2 Machinery Installations, Section 11, Table 11.13/ 11.14, compression coupling, bite type, fire resistant. For service temperatures above 40°C the reduction in pressure specified by the manufacturer is to be observed.

Test Standard VI-7-8: Test Requirements for Components and Systems of Mechanical Engineering and Offshore Technology. Edition 2008

Documents - Test report according to GL Approval Ref.-No. 09-108886, 11-135829
- Catalogue data sheet
- ISO 9001:2000 Certificate

Remarks The selection of the pipe unions for the corresponding service and the right installation are to be in accordance with the instructions of the manufacturer.

Valid until 2016-12-01

Page 1 of 1

Type Approval Symbol



File No. II.C.05

Hamburg, 2011-11-24

Germanischer Lloyd

Hanspeter Raschle

Sven Dudszus

This certificate is issued on the basis of "Regulations for the Performance of Type Tests, Part 0, Procedure".



DET NORSKE VERITAS TYPE APPROVAL CERTIFICATE

CERTIFICATE NO. P-12886

This Certificate consists of 4 pages

This is to certify that the

Pipe Couplings, Bite and Compression Type

792.21

with type designation(s)

L-Series, S-Series

Manufactured by

CAST S.P.A.

VOLPIANO TO, Italy

is found to comply with

Det Norske Veritas' Rules for Classification of Ships
Det Norske Veritas' Standards for Certification 2.9 No. 5-792.20

Application

The couplings may be used in the following: Hydraulic, Fuel, Lubrication Oil, Compressed Air, Steam and Condensate, Freshwater, Seawater and Marsh Gas systems.

| Type: | Temperature range: | Max. working press.: | Sizes: |
|----------|--------------------|-------------------------------|------------|
| L-Series | see cert. | 315 bar - 160 bar (see cert.) | 6 to 42 mm |
| S-Series | see cert. | 630 - 315 bar (see cert.) | 6 to 38 mm |

Place and date
Høvik, 2008-09-10
for Det Norske Veritas AS

This Certificate is valid until
2012-12-31





DET NORSKE VERITAS TYPE APPROVAL CERTIFICATE

CERTIFICATE NO. P-13209

This Certificate consists of 3 pages

This is to certify that the

Pipe Couplings, Flared or Welded Nipple Type

792.22

with type designation(s)

Cast ORFS SAE J 1453 90° flared fittings

Manufactured by

CAST S.P.A.

VOLPIANO TO, Italy

is found to comply with

Det Norske Veritas' Rules for Classification of Ships
Det Norske Veritas' Standards for Certification 2.9 No. 5-792.20

Application

The couplings may be used in the following systems: Hydraulic, Fuel, Lubrication oil, Compressed air, Steam and Condensate, Fresh and Sea water and Marsh gas systems.

Temperature range: -60 °C to +200 °C, see certificate

Max. working press.: 630 bar, see certificate

Sizes: 6 to 38 mm

Place and date
Høvik, 2009-07-28
for Det Norske Veritas AS

This Certificate is valid until
2013-12-31





DET NORSKE VERITAS TYPE APPROVAL CERTIFICATE

CERTIFICATE NO. P-13210

This Certificate consists of 4 pages

This is to certify that the

Pipe Couplings, Flared or Welded Nipple Type

792.22

with type designation(s)

SAE J 514 37° flared pipe fittings

Manufactured by

CAST S.P.A.

VOLPIANO TO, Italy

is found to comply with

Det Norske Veritas' Rules for Classification of Ships
Offshore Standard DNV-OS-D101, Marine and Machinery Systems and Equipment
Det Norske Veritas' Standards for Certification 2.9 No. 5-792.20

Application

The couplings may be used in the following systems: Hydraulic, Fuel, Lubrication oil, Compressed air, Steam and Condensate, Fresh and Sea water and Marsh gas systems.

Temperature range: -60 °C to 200 °C (see cert.)

Max. working press.: Depending on size, see cert.

Sizes: 6 to 38 mm.

Place and date

Høvik, 2009-07-28

for Det Norske Veritas AS

This Certificate is valid until

2013-06-30



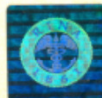
CERTIFICATO DI OMOLOGAZIONE DI TIPO
N. MAC081608CS

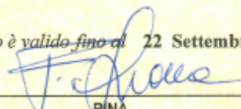


Si certifica che il seguente prodotto soddisfa le prescrizioni delle norme qui specificate.

| | |
|----------------------|--|
| Descrizione | Raccordi per tubi |
| Tipo | Ad anello tagliente DIN 2353 |
| Richiedente | CAST SPA STRADA BRANDIZZO 404 408 BIS 10088 VOLPIANO (TO) |
| Fabbricante | CAST SPA |
| Luogo di produzione | STRADA BRANDIZZO 404 408 BIS 10088 VOLPIANO (TO) |
| Norme di riferimento | Parte C, Cap. 1, Sez. 10 delle Norme del RINA |

Rilasciato a Genova il 22 Settembre 2009. Questo Certificato è valido fino al 22 Settembre 2014




RINA
Francesco Sciacca

Questo Certificato e' composto di 1 pagina e di 1 allegato.

Questo Certificato annulla e sostituisce il Certificato MAC/63702/1/TO/02 emesso in data 27 Novembre 2002.

