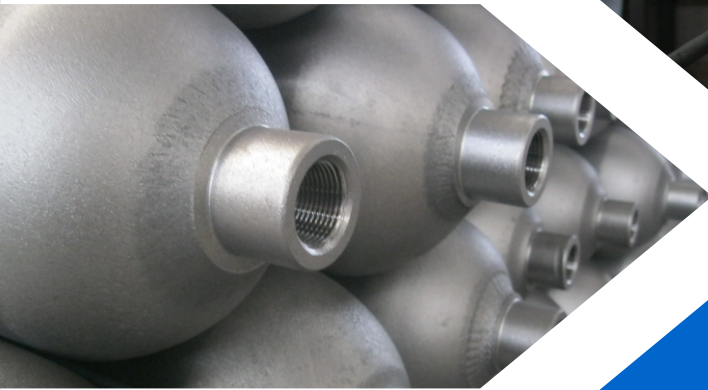
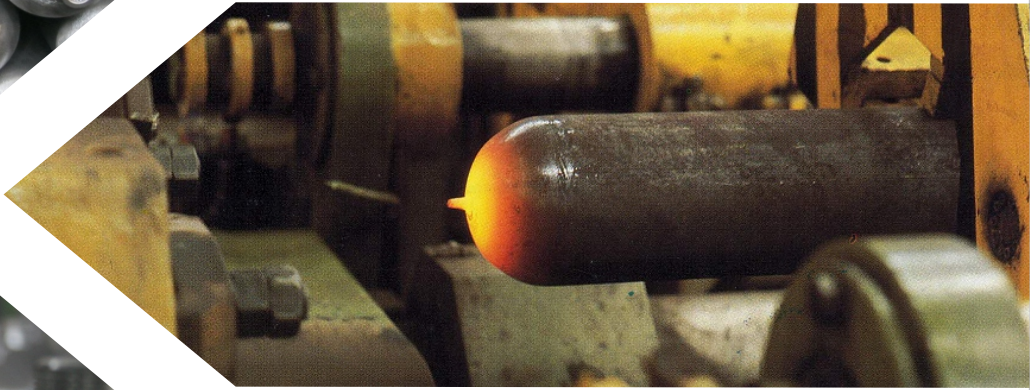




BURSAN®



About Us



BURSAN, is a subsidiary of Nevzat Fikret Kuru Holding which activates in textile, tourism, industry and metal sector. BURSAN was founded in 1976, in 35.000 m2 area in Manisa Industrial Zone, and started to produce seamless steel high pressure industrial and medical gas cylinders. Among its special designed productions BURSAN also serves to the Turkish Armed Forces as a Defence Industrialists and making the project, design and production of various equipment and land support units.

Besides dealing with other industrial activities, BURSAN is also continuing its activities in fire protection field by establishing a new organization as, Fire and Security Department. This department is dealing with the design, project and engineering of systems in accordance with NFPA Rules and VdS Standards, and providing LPCB-VdS, UL/FM approved equipments, undertaking turn-key plant projects, giving pre & after sales technical support and service, determining risk analyzes at plant and giving fire counseling services, with its specialized staff.

By finding solutions on sensing and indicating systems, BURSAN is establishing, CO2 and Halon alternative CLEAN AGENT (FM-200-NOVEC1230-CO2-NITROGEN) Gas Extinguishing Systems, Water Mist and Kitchen Hoods Extinguishing Systems, Fire Hydrant Systems, and supplying domestic and imported fire hose cabinets, fire pumps, fire stopping or delaying equipments, personal protection equipments, fire protection and fire fighting products from the companies which are represented by BURSAN.

As being the biggest manufacturer in Turkey, BURSAN is producing fire extinguishers operating with Dry Powder, CO2, Foam Concentrate, Halon Gases with the brand names as; BURSAN trade name BURSAN, who has always achieved to be the first with its production subjects, has given the BURSAN Quality Assurance to its products in his modern laboratories, approved by the Turkish Standard Institute and took his quality under assurance with a quality certification by EN ISO 9001, in 1996, without giving any appeasement of his quality since the very beginning of.

BURSAN, with its whole production being certificated and documented by TSE, TURKISH LLOYD, TUV is renewing its vision day by day and because of his quality policy aiming to reach non-conditional customer pleasure with superior service and utility understanding; increasing its products market share and reaching to success without giving any compensation of its quality, using the production methods which do not give any harm to the human and environment.

Continuing its facilities with its production line, project department and professional customer representatives in administrative departments, BURSAN is feeling the proud of being main and trustable supplier for most of the Public Associations & Establishments, and Turkish Armed Forces. BURSAN has a wide reference list including domestic establishment and associations, and foreign companies.





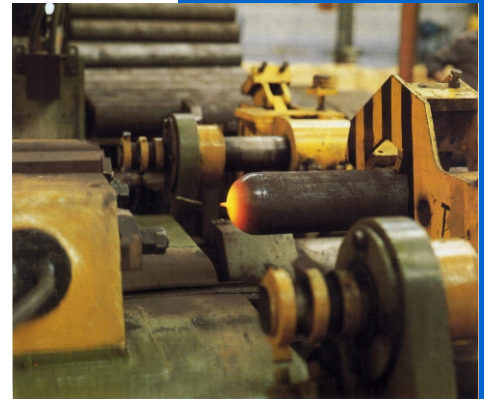
Our quality policy & production

"In order to maintain our leadership in the Turkish market with the products we produce and the services we provide, and to increase the sales and product satisfaction of our customers in the world market;"

Our quality policy,

To regularly produce products and services which meet the provisions of the relevant Law, Regulations, Standard and Legislation, customer requests, and terms of use,

- "Establishing the Quality System, Fulfilling the Applicable Quality Conditions,"
- "To ensure that the quality system is fully understood within the organization,"
- Ensuring the conformity of the organization's policy with its strategic objectives,
- Creating the quality system PROCESSES, evaluating the opportunities and risks of the created PROCESSES, reviewing their effectiveness,
- To ensure that the pressure equipment is produced in accordance with the safety performance
- To inform Bursan employees, suppliers and customers about quality and product,
- To have an understanding of quality production and service that is environmentally friendly, suitable for work safety and product safety,
- Customer-focused production and timely and complete delivery to the customer,
- To ensure continuous improvement in all production and control processes and with the participation of all employees,
- It is the basic policy of our company to ensure the satisfaction of partners (customers, suppliers, employees, etc.).





Our Laboratory Services

BURSAN is constantly improving itself so that all production and control processes can be applied in the best way.

With continuous training and individual support tools, we provide our employees with the confidence and motivation they need to implement the BURSAN quality philosophy.



Our quality management system is certified within the scope of EN ISO 9001:2015 standard approved by TUV SUD. It meets the requirements of PED 2014/68/EU Pressure Equipment Regulation, TPED 2010/35/EU Portable Pressure Equipment Regulation, ADR and other national/international regulations.



Our quality system is regularly audited by our company and approved organizations and our products are tested. The inspections and controls carried out ensure that our products are presented to our customers in accordance with the specified standards and regulations.



The Service, Maintenance and Repair Services

It is our basic principle not to compromise on quality in the design and production of our products, and we know that it is imperative for us to work harder than the previous day in order to be successful.





High Pressure
Seamless Steel
Cylinders



Fire Fighting
Extinguishers



Gas Extinguishing
Systems



Chlorine Tanks And
Welded Cylinders



Acetylene
Cylinders



Special
Projects

High Pressure Seamless Steel Cylinders

O2,N2,HE,CO2,Ar,Mixture and other high pressure gases.

INDUSTRIAL GAS CYLINDERS

CAPACITY	STANDARD	MATERIAL	O.D. MM	WORKING PRESSURE	TEST PRESSURE	WALL THICKNESS	BOTTOM SHAPE
2	EN ISO 9809-1	34CrMo4	101,6	207	310	2,80	Convex
2	EN ISO 9809-1	34CrMo4	108	207	310	2,70	Convex
2,67	EN ISO 9809-1	34CrMo4	108	207	310	2,70	Convex
3	EN ISO 9809-1	34CrMo4	108	207	310	2,70	Convex
4	EN ISO 9809-1	34CrMo4	139,7	230	345	3,47	Convex
4,25	EN ISO 9809-1	34CrMo4	139,7	230	345	3,47	Convex
5	EN ISO 9809-1	34CrMo4	139,7	230	345	3,47	Convex
6,67	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
7,5	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
8	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
10	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
13,4	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
13,4	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex
20	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex
26,7	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex
32	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex
40	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex
32	EN ISO 9809-1	34CrMo4	229	230	345	5,44 / 5,40	Convex/Concave
40	EN ISO 9809-1	34CrMo4	229	230	345	5,44 / 5,40	Convex/Concave
50	EN ISO 9809-1	34CrMo4	229	230	345	5,44 / 5,40	Convex/Concave
67	EN ISO 9809-1	34CrMo4	267	207	310	6,2	Convex
40	EN ISO 9809-1	34CrMo4	229	200	300	5,48	Convex
50	EN ISO 9809-1	34CrMo4	229	200	300	5,48	Convex

HYDROGEN CYLINDERS

CAPACITY	STANDARD	MATERIAL	O.D. MM	WORKING PRESSURE	TEST PRESSURE	WALL THICKNESS	BOTTOM SHAPE
40	EN ISO 9809-1	34CrMo4	229	200	300	5,48	Concave
50	EN ISO 9809-1	34CrMo4	229	200	300	5,48	Concave

BEVERAGE
CO2 CYLINDERS



CAPACITY	STANDARD	MATERIAL	O.D. MM	WORKING PRESSURE	TEST PRESSURE	WALL THICKNESS	BOTTOM SHAPE
2,67	EN ISO 9809-1	34CrMo4	108	207	310	2,70	Convex/Concave
3	EN ISO 9809-1	34CrMo4	108	207	310	2,70	Convex/Concave
6,67	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
7,5	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
8	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
10	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
13,4	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex/Concave
20	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex/Concave

MEDICAL
GAS CYLINDERS

CAPACITY	STANDARD	MATERIAL	O.D. MM	WORKING PRESSURE	TEST PRESSURE	WALL THICKNESS	BOTTOM SHAPE
2	EN ISO 9809-1	34CrMo4	108	207	310	2,70	Convex/Concave
5	EN ISO 9809-1	34CrMo4	139,7	230	345	3,47	Convex/Concave
10	EN ISO 9809-1	34CrMo4	139,7 / 140	230	345	3,47 / 3,50	Convex/Concave
40	EN ISO 9809-1	34CrMo4	204	230	345	5,06	Convex/Concave
40	EN ISO 9809-1	34CrMo4	229	230	345	5,44/5,40	Convex/Concave
50	EN ISO 9809-1	34CrMo4	229	230	345	5,44/5,40	Convex/Concave



The gas cylinders are being manufactured from high quality special alloyed seamless steel pipes in accordance with TS EN ISO 9809-1. Working pressure is maximum 230 Bar and test pressure is maximum 345 Bar.

Our gas cylinders are shipped safely and certificated to the clients after being subjected to the tests and examinations at the Bursan laboratories at every stage of the production, starting from the raw material stage.



The gas cylinders are produced in accordance with standards according to all kinds of industrial and medical gas types, and are produced in different volumes from 2 Lt capacity to 180 Lt capacity, with 200 Bar - 230 Bar - 250 Bar working pressure and 345 Bar test pressure.

Portable
Fire Extinguishers

PORTABLE DRY CHEMICAL
POWDER FIRE EXTINGUISHERS



CAPACITY	TYPE	EXINGUISHING AGENT	WORKING PRESSURE	TEMPERATURE RANGE	CERTIFICATION
2 KG	PRESSURIZED	ABC MAP	18±1 BAR	-20°C / +60°C	PED / MED TS EN 862-7 EN 3-7+A1
4 KG					
6 KG					
9 KG					
12 KG	INTERNAL CARTRIDGE	ABC MAP	18±1 BAR	-20°C / +60°C	PED / MED TS EN 862-7 EN 3-7+A1
4 KG					
6 KG					
9 KG					
12 KG					

PORTABLE FOAM
FIRE EXTINGUISHERS

CAPACITY	TYPE	EXINGUISHING AGENT	WORKING PRESSURE	TEMPERATURE RANGE	CERTIFICATION
6 LT	PRESSURIZED	%3 - %6 - AFFF FOAM	17 BAR	+5°C / +60°C	PED / MED TS EN 862-7 EN 3-7+A1
9 LT					



PORTABLE WATER
FIRE EXTINGUISHERS

CAPACITY	TYPE	EXINGUISHING AGENT	WORKING PRESSURE	TEMPERATURE RANGE	CERTIFICATION
6 LT	PRESSURIZED	WATER	17 BAR	+5°C / +60°C	PED / MED TS EN 862-7 EN 3-7+A1
9 LT					

PORTABLE CLEAN AGENT
FIRE EXTINGUISHERS

CAPACITY	TYPE	EXINGUISHING AGENT	WORKING PRESSURE	TEMPERATURE RANGE	CERTIFICATION
2 LT HFC	PRESSURIZED	HFC-236fa	17 BAR	-20°C / +60°C	PED / MED TS EN 862-7 EN 3-7+A1
4 LT HFC					
6 LT HFC					





PORTABLE CARBONDIOXIDE GAS FIRE EXTINGUISHERS

CAPACITY	EXINGUISHING AGENT	TEMPERATURE RANGE	CERTIFICATION
2 Kg CO ²	Co ²	-20°C / +60°C	PED / MED TS EN 862-7 EN 3-7+A1
5 Kg CO ²			

Wheeled Fire Extinguishers

Co2 FIRE EXTINGUISHERS

CAPACITY	EXINGUISHING AGENT	CERTIFICATION
10 Kg CO ²	Co ²	PED TS EN 1866-1
30 Kg CO ²		
30 Kg + 30 Kg CO ²		

DRY POWDER CHEMICAL EXTINGUISHERS

CAPACITY	TYPE	EXINGUISHING AGENT	CERTIFICATION
50 KG	PRESSURIZED	ABC MAP	PED TS EN 1866-1



WATER FIRE EXTINGUISHERS

CAPACITY	TYPE	EXINGUISHING AGENT	CERTIFICATION
50 Lt Water	PRESSURIZED	Water	PED TS EN 1866-1



FOAM FIRE EXTINGUISHERS

CAPACITY	TYPE	EXINGUISHING AGENT	CERTIFICATION
50 Kg Foam	PRESSURIZED	%3 - %6 AFFF Foam	PED TS EN 1866-1



Gas Extinguishing System

A gas extinguishing system is a fire extinguishing system that extinguishes fire with the help of a gaseous extinguishing agent either through oxygen displacement (reduction of oxygen content) or physical effects (heat extraction).

Gas extinguishing systems are the "cleanest" extinguishing systems. Extinguishing gases have no influence on conventional electrical systems such as servers, etc. A range of different extinguishing gases can be used for the extinguishing system.

The specific properties of the different extinguishing gases also define their area of use. Our company has already designed, hydraulically calculated and constructed a large number of gas extinguishing systems according to NFPA, VDS, EN (ISO14520) or UL/FM standards.

Our company which is the solution partner of SIEMENS TR serves our customers with SIEMENS and BURSAN quality.



AREAS OF USE OF GAS EXTINGUISHING SYSTEMS INCLUDE FOR EXAMPLE:

- IT systems and computer rooms
- Archive rooms, document safes
- Emergency call centres, flight navigation and control towers, mobile phone transmitter stations, internet service provider centres, television, radio and control rooms, microwave substations.
- Art galleries, libraries, film projector rooms, museums
- Medical sector: imaging systems, operating rooms, mobile stations
- Industrial facilities such as laboratories, control rooms, offshore drilling platforms, robotic equipment
- Emergency power generators, battery compartments, low-voltage compartments, cable compartments, etc.
- Flight simulators, ships, military vehicles



Novec 1230 ® Gas Extinguishing Systems



The extinguishing effect of Novec 1230 in stationary fire extinguishing systems is due to a homogeneous inhibition (disruption of the combustion chain reaction). The molecule is not electrically conductive. With a global warming potential (CO2 equivalent) of 1, it has the lowest value of all currently approved chemical extinguishing agents and disintegrates within a few days under solar radiation. Combined with Siemens' technology and BURSAN's trained expert staff and engineering skills, turnkey project services are provided for gas extinguishing systems.

We provide solution under two brands.

BURSAN HFC227ea2 | SIEMENS Sinorix227

**Data processing centers / IT Rooms Archive Rooms /
Data Safes Electrical Control Rooms Telecommunication**

- Switch Rooms
- Cable Distribution Panels
- Control Rooms
- UPS / Battery Rooms Power Plants
- Turbines Manuscript Rooms Archives

**Museums, Field Transmitter Centers,
Air Traffic Control Towers Hospitals and Health Centers**

- CT X-Ray Rooms
- MRI Rooms
- IT Centers
- Marine Applications
- Engine Rooms
- Radio Rooms
- Generator Rooms
- Lanterns
- Waste Disposal Rooms



Fm 200 (HFC227ea) Gas Extinguishing Systems

FM 200 (HFC227ea) GAS EXTINGUISHING SYSTEMSHFC227ea, the most common clean agent on the market, has two main cooling effects:

1-Direct cooling of flame (through heat absorption)

2-Indirect cooling effect (oxygen transport to flames) reduction)

Another important aspect is that FM-200 is not harmful to sensitive devices. It is a clean, gaseous substance without particles or oily residue. It does not cause a significant reduction of the oxygen content and is therefore also suitable for human-occupied premises. After it has been activated, it can be extracted through simple ventilation measures.

We provide solution under two brands.

BURSAN HFC227ea2 | SIEMENS Sinorix227



WHERE FM-200™ GAS SYSTEMS ARE USED

- Computer Rooms
- Telephone and Power Plants
- Contact Centers
- Generator Parts
- Distribution centers
- Safe sections of banks
- Museums
- Usually art galleries
- Rooms where systems are controlled
- Libraries of Schools
- Storage Spaces
- Tanks containing liquids such as drugs and acetone



Carbondioxide (CO₂) Gas Extinguishing Systems

Carbon dioxide is primarily suitable for fighting fire classes B and C. Due to its physical properties, carbon dioxide is the only extinguishing gas that is also used in fire extinguishers and fire extinguishing devices. In stationary fire extinguishing systems, carbon dioxide is stored in a liquefied state in high-pressure steel cylinders or cooled to $-20\text{ }^{\circ}\text{C}$ in large low-pressure containers.

By storing it as a liquid, significantly larger volumes of extinguishing agent can be stored efficiently. BURSAN delivers and installs turnkey projects with VDS / LPCB approved equipments and expert staff.

EFFECTIVE FAST; CO₂ is a clean three-dimensional extinguishing agent. In seconds, it covers the entire volume and extinguishes fires by reducing (suffocating) the oxygen.

EFFICIENT, LOW COST AND CLEANNON-HARMFUL; CO₂ does not damage equipment, materials and assets.

NOT CONDUCTOR AND EASE OF IMPLEMENTATION; (Co₂) It is effective in surface area fires of flammable and easily ignited liquid chemicals and in deep internal fires of solid chemicals.

EASE OF OPERATION; BURSAN (CO₂) systems can be used manually as well as work automatically by being applied together with fire detection systems.



BURSAN CO₂ Gas Fire Extinguishing Systems

- Introduction of (CO₂) systems
- Design of systems in accordance with international standards
- Measurement of the volumes to be protected against the risk of fire in the field
- Certified hydraulic calculation
- Engineering services supported by projecting with Autocad and isometric drawings
- Supply and delivery of VDS or UL/FM approved equipment from stock in a short time
- Pre-sales consultancy and training, after-sales service and support.



Inert Gas Fire Extinguishing System



The following natural gases are suitable for extinguishing purposes because they are gaseous under ambient conditions and can be obtained from the atmosphere without consuming significant energy:

- IG-100 Nitrogen
- IG-01 Argon
- IG-541 Inergen Nitrogen + Argon + Carbondioxide
- IG-55 Argonite Nitrogen + Argon

It is colorless, odorless and non-conductive. It extinguishes by reducing the oxygen in the environment and does not require cleaning after discharge. BURSAN offers turnkey projects with superior engineering services and certified products.



Door Fan Test For Gas Extinguishing Systems

Gas-extinguishing systems make special requirements during the planning phase because, in order to evaluate the effectiveness of the gas-extinguishing facility, it is important to know how leakproof the room to be protected actually is.

Based on these measurements, it can be determined how large the leakage area is in the room. This value influences the composition and holding time of the intended extinguishing gas concentration. With the door fan test, cost and time-intensive flooding tests can be kept to a minimum.



Kitchen Fire Protection System



- The risk of fires in kitchen cooking appliances is high and very difficult to extinguish. Kitchen fire extinguishing system is the easiest and most effective way to extinguish these fires.
- Automatic or manual system activation releases a throttle discharge of potassium carbonate solution on the protected area in the form of fine droplets to suppress the fire and help prevent reignition after the discharge is complete.



Acetylene Cylinders



- Acetylene cylinders are produced according to EN 1800 standard in accordance with TPED 2010/35 / EC directive and ADR with PI (π) marking.
- Acetylene cylinders are manufactured in accordance with EN 13322-1 by welding technology.
- Marking PI (π) is made in accordance with TS EN ISO 13769.
- It consists of welded cylinder, porous material, acetone and gaseous acetylene produced by inert-gas welding and submerged welding method.
- The volume of water is 55 liters. The acetylene content is 9 kg.
- Triple compound(Porous substance + Solvent + Acetylene gas) is present in the cylinder.
- The colors of the acetylene cylinders are yellow (RAL 1018) according to the RAL codes specified in TS EN 1089-3: 2011.



TYPE OF PRODUCT	O.D. (mm)	WALL THICKNESS (mm) min.	TEST PRESSURE (bar) max.	VOLUME (Lt)
WELDED CYLINDER	Ø 315	5	60	55

Special Projects

The Nitrogen Service Unit

The Nitrogen Service Unit is mounted on a three-wheeled trailer, provided that it is towed or transported by an towing vehicle. The unit ensures the nitrogen gas in the 6 cylinders (each of which is 50 liters)with adjustable pressure between 200-3500 PSI to be pressurized by natural flow or the pump on unit as much as the system needs.

An important feature of the Nitrogen Service Unit is that the pump of unit can be actuated from the pressurized tubing on the unit without the need for any external actuating energy. The pump can be actuated from both the unit's tubing and an external low-pressure air supply. The main aim of the Nitrogen Service Unit is to pressurize the nitrogen gas required for the aircraft wheels and systems.



Underwater Rescue Project

Turkish Naval Forces Command / TUZLA; Underwater rescue project.

Submarine Rescue Master Ship "TCG ALEMDAR (A-601)", (will have the possibility to rescue personnel from submarine up to 600 meters depth)

Rescue and Refueling Ship "TCG ISIN (A-583)" and "TCG AKIN (A-585)", (which can perform search and rescue activities up to 3.000 meters depth)

For use in the above-mentioned vessels;

Into 10feet (3pcs) and 20feet (3pcs) produced containers; 5x2 (64pcs) bundles were placed. In addition, being 5x1 dimensionally accurate 3pcs built bundles and 3 pcs spare bundles were produced. 4x1 (3pcs), 2x1 (3pcs) Carrying cases are produced. Standard of applied bundles is EN 10961, ADR / RID 2015, TPED 2010/35 / EC. A total of 735 cylinders in tube bundles are manufactured according to EN 9809-1, ADR / RID 2015, TPED 2010/35 / EC.

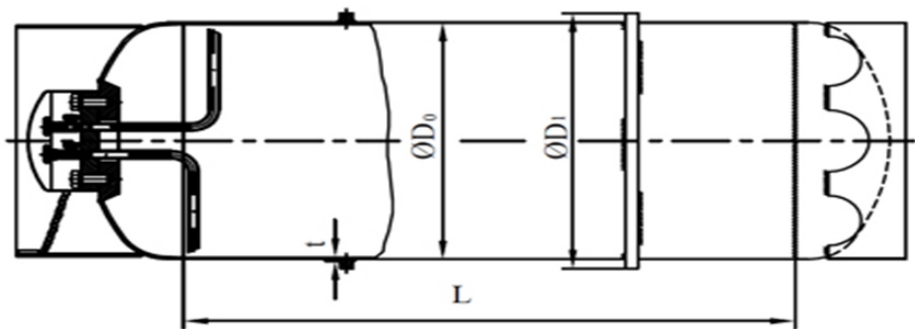




Chlorine Tanks

Chlorine tanks are manufactured in accordance with EN 14208 standards from special alloyed materials with high technology.

OUTSIDE DIAMETER	LENGHT (mm)	MIN. WALL THICKNESS (mm)	TEST PRESSURE (9,56 mm)	MIN. WALL THICKNESS (mm)	TEST PRESSURE (7,19 mm)	/ WATER CAPACITY (Lt)	CHLORINE CAPACITY FILLING FACTOR 1,25 kg/lit	EMPTY WEIGHT (kg)
770	1345	9,56	48 BAR	7,19	36 BAR	400	500	300
	1585					500	625	370
	2225					800	1000	600
	2355					840	1050	630

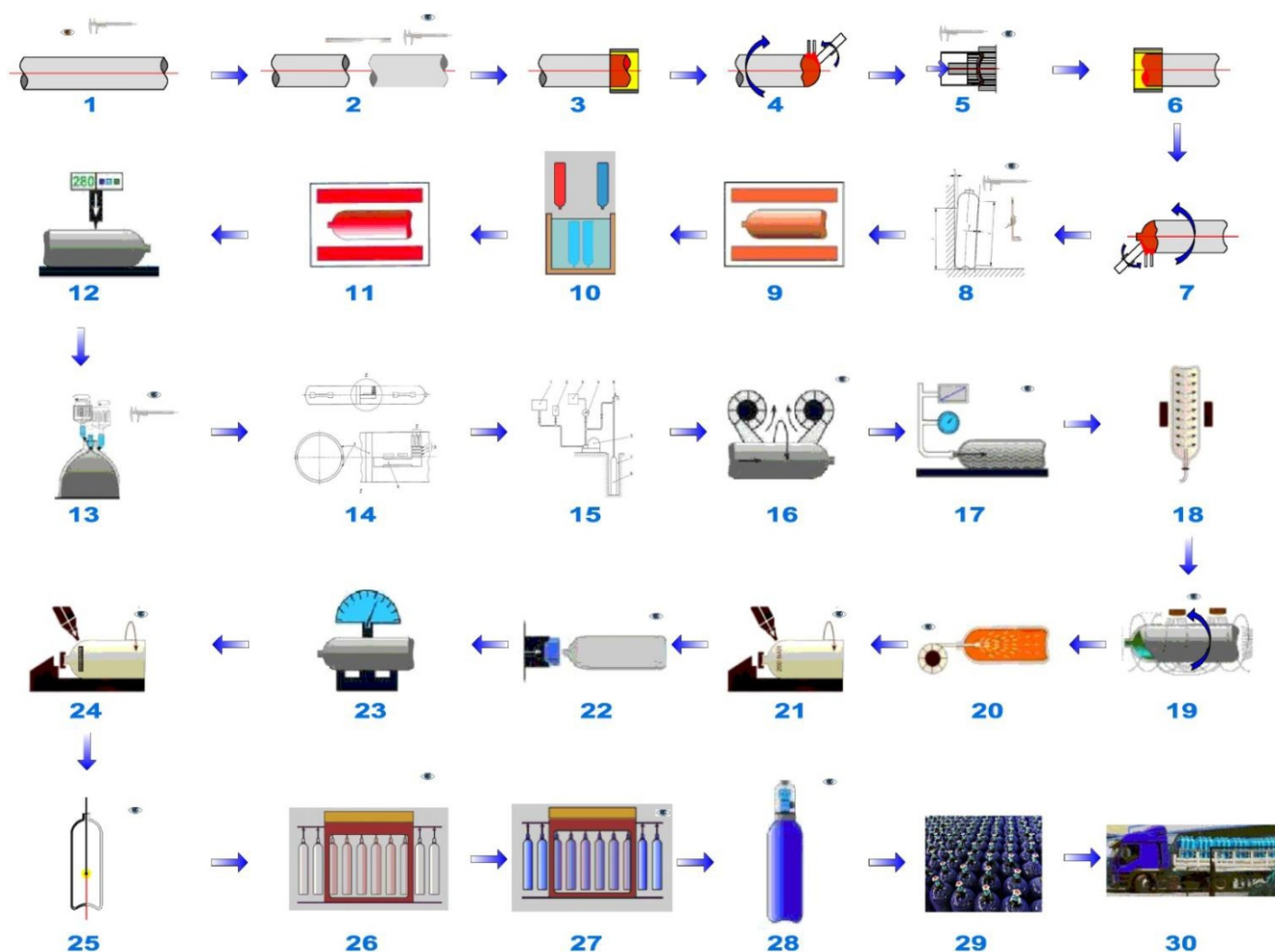


Welded Cylinders

It is manufactured by combining with the welding in the form of two or three pieces in the form of sheets with suitable physical and chemical properties.

OUTSIDE DIAMETER (mm)	CAPACITY	STANDARD
Ø 254 ~ Ø510	22 - 150	EN 13322-1
Ø510 ~ Ø610	150 - 600	EN 14208

Manufacturing Process of Seamless Steel Gas Cylinders



- 1 Incoming quality control
- 2 Tube cutting
- 3 Bottom heating
- 4 Bottom spinning
- 5 Press

- 6 Neck heating
- 7 Neck Spinning
- 8 Straightness and uprightness check
- 9 Heat treating
- 10 Quenching

- 11 Tempering
- 12 Hardness test
- 13 Neck drilling and machining
- 14 Mechanic tests
- 15 Hydraulic bursting test

Turkey's Brand Since 1976

- 16 External shot blasting
- 17 Hydraulic inspection
- 18 Drying
- 19 Internal shot blasting
- 20 Ultrasonic inspection

- 21 Marking
- 22 Neckring assembly
- 23 Weighing for tare and capacity
- 24 Marking
- 25 Internal and external faults check

- 26 Painting coating
- 27 Painting
- 28 Accessories assembly
- 29 Final check
- 30 Packaging and shipment

Our Reference Customers



More at www.bursan.com'da



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