

A fresh approach to foam pumping from a secure foundation

FOAM PUMPS FOR THE FIRE INDUSTRY



Introduction

Albany Pumps makes a wide range of standard, customised and specialised positive displacement pumps in the UK. If you require an external gear pump or a twin screw pump, we think you've found the right place:

- 100+ years of experience and British manufacture
- Employee ownership with a Trust to guarantee longevity
- CNC production plant in Lydney, Gloucestershire
- Service and repair centre in Bradford, West Yorkshire
- Standards for every industry ATEX, CE, BSI, VdS and API.
- 100+ countries sold to
- Over 5,000 proven application stories
- We own, manufacture and can support all of these brands:
 - Stothert & Pitt
 - Crown
 - Stanhope
 - Stanwin
 - Brooke
 - Handoll
 - Barclay Kellett

How to use this guide

This Guide is designed to assist you in the understanding of our Gear or Screw pump ranges and therefore help in the specification and order of pumps.

We often have more than one range or even type of pump that we have used in your industry and therefore offer a choice wherever possible. This choice may be an economy range or a lifelong range depending upon your capital expenditure requirements or could be industry-led by need for specification/certification, such as API or VdS.

We have applications engineers across the UK and worldwide who can assist you in pump selection against process data given and your own individual needs.

Each product featured throughout these pages has its own downloadable technical brochure. See our website.



Your local agent:

Global Sales and Service from two British centres

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Head Office (Option 1)

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Service and Repair (Option 2).

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Pumping solutions for the FIRE industry

Experience

At Albany Pumps we have over 100 year's expertise serving your industry. Our positive displacement pumps can be found in a wide variety of industries the world over. If you require a Gear Pump or Twin Screw Pump, we have more than 1000 years of collective experience within our Employee Owners and we are experts in your industry. Get in contact with us for more information about these particular industry solutions and we will be pleased to assist you.

With our ranges of gear and twin screw pumps, Albany are sure to be able to satisfy your positive displacement pump needs.

Albany supply gunmetal, stainless steel and cast iron cased foam concentrate gear pumps. They are used on fire trucks and fixed installations both off-shore and on-shore in the world's oil and gas production and manufacturing industries, and in other hazardous areas where fire fighting equipment is required. The pumps will supply up to 1400 litres per minute of foam liquid at pressures up to 22 bar, with screw pumps available to supply up to 3000 litres per minute. Albany's engineering expertise includes a high level of customisation, ensuring that pumps can be supplied to meet the exacting needs of the fire fighting market. Certain pumps are VdS Certified.



Download pump size and flow rate data from our website.
www.albany-pumps.co.uk



G: External gear type pump range for the FIRE industry

G: D Style: 3.1 certified Fire/foam pumps (remote bearing) *Materials: CI | CS | SS | GM*

The GD range is a semi-remote bearing design pump. In this design the shaft bearings do not come into contact with the product being pumped. This is important for applications where the liquids being pumped could have a detrimental effect on the shaft bearings. These pumps are NFPA20 compliant and can handle viscosities down to 1cSt. Suitable for foam type applications involving testing with water or extremely low viscosity foams.



The complete range will be available in Q4 2017

Maximum working pressure 22 BARg	Pump size range 1/2" - 4"	Maximum temperature 180°C	Flow rate 230-1400 L/M
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G: E Style: 3.1 certified Fire/foam pumps (VdS) *Materials: CI | GM | SS*

Albany is a market leader in the field of foam concentrate pumps and the GE range is our standard foam concentrate pump: a popular choice for many years in the fire industry. All models are NFPA20 compliant and certain models are VdS certified. The pumps can be run on water for 10 minutes at duty point or for 1 hour total at minimum 1000 rpm, 10 barg maximum.

Designed for fixed and vehicle applications, GE style pumps can be supplied as a pump only unit, or mounted on a baseplate and driven by a prime mover such as an electric motor or a diesel engine. For the ultimate in safety, we offer pumps directly coupled to a Pelton (water) wheel. The latter are popular in offshore and refinery applications.

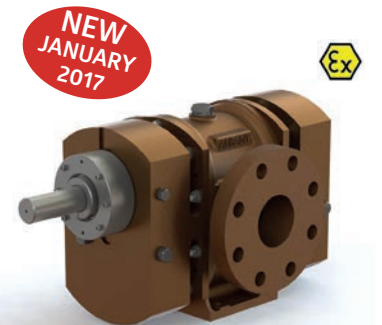


Maximum working pressure 22 BARg	Pump size range 1/2" - 4"	Maximum temperature 180°C	Flow rate 25-1600 L/M
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G: F Style: 3.1 certified Fire/foam pumps *Materials: CI | GM | SS*

As with the GE range, the GF range is primarily a foam concentrate pump, the difference being these pumps are designed for liquids of a lower viscosity. Pumps can be tested on lower viscosity liquids including water for up to 30 hours (on water) before foam use. With a lipseal shaft sealing, the pump is capable of dry running (will surpass industry requirement). Available as a pump only unit or mounted on a baseplate coupled to a prime mover.

In order to meet water test requirements, prior to use, the bearings, rotors and shafts in the pumps have been significantly adjusted to suit these applications.



Maximum working pressure 22 BARg	Pump size range 1/4" - 4"	Maximum temperature 180°C	Flow rate 80-1000 L/M
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G: O Style: Vehicle pumps *Material: AL | CI*

The GO range is a series of pumps that are lightweight and have double helical gears for quiet operation. They are not suitable for hazardous materials.



Maximum working pressure 7 BARg	Pump size range 2" - 4"	Maximum temperature 180°C	Flow rate 230-960 L/M
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G: S Style: Vertical pumps *Materials: AL | CI | GM | HY | SS*

The GS range is a vertical pump derived from the GA range and can incorporate pipework of up to 4 metres. This is a highly customisable range, as we can supply a wide range of pumps in a choice of mounting plates with columns in different lengths and styles.

The ability to submerge the pump in the fluid is popular in various industries including bitumen and liquid sulphur. Grease is available for intermediate bearings as required. We also make stainless steel pumps for solvent applications.



Individual technical brochures for each pump style can be downloaded from our website



AL Aluminium | CS Cast Steel | CI Cast Iron | GM Gunmetal | HY Hastelloy | NR Ni-resist | NY Nylon | PP Polypropylene | SD Super Duplex | SS Stainless Steel

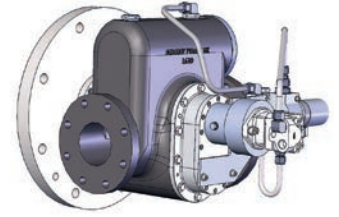
G: External gear type pump range for the FIRE industry

G: X Style: Customised pumps

All materials

Special pumps. How do you define a range of pumps which is only constrained by our customer's requirements? At Albany, we are always willing to speak to you about producing a special product to meet your needs and many diverse pumps have been produced within the GX range.

We are also able to manufacture customised Twin screw pumps (S: X Style) for special requirements.



Maximum working pressure 40 BARg	Pump size range 1/2" - 6"	Maximum temperature 220°C	Flow rate 25-1900 L/M
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S: Twin screw type pump range for the FIRE industry

Albany Pump's S range is a versatile series of Screw pumps that can handle fluctuating flow rates and pressures without losing efficiency. This range is renowned for their low noise levels, high reliability and long life.

S: B Style: External bearing pumps

Materials: CI | CS | SD | SS

This is similar to the SA style but allows a greater choice of sealing arrangements including API676 types and higher temperature and pressure operation. Again with various heating options and internal relief valve choice. (Original model SH2)

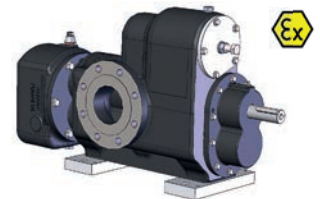


Maximum working pressure 30 BARg	Pump size range 3" - 10"	Maximum temperature 300°C	Flow rate 10-600 M ³ /HR
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S: C Style: Internal bearing pumps

Materials: CI | CS | SD | SS

The SC style is only suitable for non-abrasive lubricating liquids. The bearings and timing gears are lubricated by the pumped liquid. It has only one mechanical seal making it a lower cost option with clean lubricating liquids. Heating and relief valve options are available. (Original model SH1)



Maximum working pressure 30 barg	Pump size range 3" - 10"	Maximum temperature 200°C	Flow rate 10-600 M ³ /hr
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S: D Style: Vertical internal bearing pumps

Materials: CI | CS | SD | SS

The SD range is mostly used for clean liquids of low viscosity and is similar to the SA style. This range is popular in maritime applications where space saving capability is a benefit. (Original model SV3)



Maximum working pressure 20 BARg	Pump size range 3" - 10"	Maximum temperature 200°C	Flow rate 10-600 M ³ /HR
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S: E Style: vertical internal seal pumps

Materials: CI | CS | HY | SD | SS

The SD range is mostly used for clean fluids of low viscosity. This range is popular in maritime applications where its space saving capability is a benefit.



Maximum working pressure 50 BARg	Pump size range 3" - 12"	Maximum temperature 300°C	Flow rate 10-1000 M ³ /HR
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We can supply direct replacements for all of the Stothert & Pitt pumps made, using our library of their original drawings dating back to the 1930s.

Individual technical brochures for each pump style can be downloaded from our website

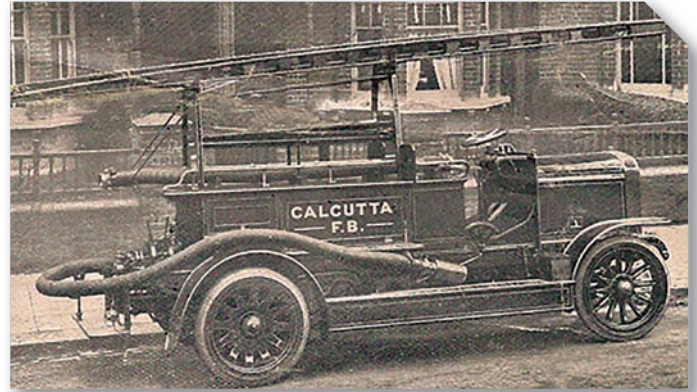


AL Aluminium | CS Cast Steel | CI Cast Iron | GM Gunmetal | HY Hastelloy | NR Ni-resist | NY Nylon | PP Polypropylene | SD Super Duplex | SS Stainless Steel

100 years of applications all in one database

Albany Pumps has been leading the way in pump solutions for fire processes for decades. Our experience spans a wide variety of applications and we have examples of case studies in the fire market to draw upon, creating an enviable resource for our clients.

We have unsurpassed experience across a wide range of industries, we have successfully developed a database of over 30,000 projects. Our team of expert technical engineers is able to offer advice based on these successful projects. Below is a selection and we have many more. To discuss your particular needs and to find out about our relevant experience, please feel free to contact our sales team and look on our website for the full database.



We can help you design a pump for your particular requirement.

Get started with our handy configurator tool on our website – our trained engineers will then be able to assist in fine-tuning your solution.

The screenshots show the Albany Pumps website interface. The top screenshot displays the 'Configure a Pump' tool, which includes a navigation menu, a search bar, and a 'Configure a pump' button. Below this is a 'Quick Pump Search' section with dropdown menus for 'File', 'Cast Iron (CI)', 'External Gear Pumps', and 'SD - 31 certified Fire engine pumps (6 more bearings)'. The bottom screenshot shows the 'List of Pumps based on your selection' page, which includes a table of pump specifications and a 'Print' button.

This screenshot shows the 'Configure a Pump' tool interface. It includes a 'Select your industry or market sector' dropdown, a 'Pump Type' dropdown, a 'Pump Style' dropdown, a 'Frame Size' dropdown, a 'Build Assembly' dropdown, a 'Rotor Length' dropdown, and a 'Search Connections' dropdown. Below these are radio button options for 'Pump Mounting' (A, B, C, D, N, O, P, Q) and 'Pump Rotation' (TDIOW, TDICW, BDIOW, BDIOW, PELTON WHEEL, PELTON WHEEL, PELTON WHEEL).

MARKET SECTOR	LIQUID BEING PUMPED	NUMBER	Pump Range & Style	Frame Size	QTY	FLOW (L/min)	RPM	ROTATION	SG	VISCOSITY	ABRASIVES	SUCTION	DISCH
2	FIRE	FOAM CONCENTRATE	M12/322	DEM	AP115	2	400	1600					
3	FIRE	FOAM CONCENTRATE	M12/061	GE	AP010	2	90	1450					
4	FIRE	FOAM CONCENTRATE	M13/186	GE	AP050	2	200	1500					
5	FIRE	FOAM CONCENTRATE	M13/309	DEM	AP130	2	750	1600					
6	FIRE	FOAM CONCENTRATE	M13/418	DEM	AP120	21	800	1950					
7	FIRE	1% FOAM	M13/322	GE	AP040	1	175	1420					
8	FIRE	1% AFF FOAM CONCENTRATE	M13/326	GE	AP110	1	233	1230					
9	FIRE	1% AFF FOAM	M13/335	GE	AP100	1	980	950					
10	FIRE	FOAM CONCENTRATE	M13/441	GE	AP050	1	200	1420					
11	FIRE	FOAM CONCENTRATE	M13/357	GE	AP110	2	320	1420					
12	FIRE	1% AFF FOAM	M13/374	GE	AP040	1	18	1100					
13	FIRE	FOAM CONCENTRATE	M13/391	DEM	AP100	1	210	1800					
14	FIRE	FOAM CONCENTRATE	M13/411	GE	AP040	1	30	1750					
15	FIRE	FOAM CONCENTRATE	M13/412	GE	AP080	1	831	975					
16	FIRE	FOAM CONCENTRATE	M13/418	DEM	AP050	2	150	2400					
17	FIRE	FOAM CONCENTRATE	M13/440	GE	AP110	2	300	1420					
18	FIRE	FOAM CONCENTRATE	M13/442	GE	AP130	1	750	1450					
19	FIRE	FOAM CONCENTRATE	M13/507	GE	AP070	2	100	1600					
20	FIRE	1% FOAM	M13/509	GE	AP010	1	75	1420					
21	FIRE	FOAM LIQUID	M13/530	DEM	AP080	7	0	2100-2150					
22	FIRE	FOAM GN	M13/538	GE	AP050	1	144	1420					
23	FIRE	FOAM GN	M13/539	GE	AP050	1	144	1420					
24	FIRE	FOAM LIQUID	M13/541	GE	AP050	2	32	1720					
25	FIRE	THICK TRIDROP FOAM	M13/554	GE	AP100	1	300	1763					
26	FIRE	FOAM CONCENTRATE	M13/558	GE	AP130	2	300	960					
27	FIRE	FOAM AFF	M13/566	GE	AP050	2	25	1080					
28	FIRE	FOAM AFF	M13/566	GE	AP050	2	25	1080					

A small snapshot of our application database to help evaluate your next project.