



AUDEX
INDUSTRIAL DEWATERING



Providing pump solutions to industry, globally

Intrax is a global leader in specialist pumping equipment for difficult and challenging industrial applications. We are best known for excellence in bringing innovative and cost-saving ideas to our customers as well as offering unrivalled levels of customer service and response times.

Our combined wealth of experience and technical know-how in highly sophisticated applications has allowed us to work closely with the engineering teams on large-scale projects across the globe firmly establishing us as their trusted partner.



AUDEX is Part of the Intrax Group

Expertise

Intrax tackles aggressive and abrasive pumping challenges that conventional pump manufacturers shy away from. An in-depth cross organisational knowledge of aggressive fluid handling and an association with leading polymer developers and foundries globally provides a level of expertise disproportionate to the individual companies and brands.

Understanding

The Intrax companies and brands have truly evolved to relieve customer pain points and hence bring a refreshingly different approach to the rigid stance often taken by market incumbents. Intrax products have also evolved intelligently, influenced by individual customer's demands, and this progress is on-going.

Energy

Our partners often comment on the energy and motivation within our companies and how enjoyable it makes their interactions with us. We think that this is because of the ethos of our brilliant, highly-trained workforce who have been recruited to deliver cutting-edge solutions without the prejudices of a lifetime of offering conventional and often outdated technology

Innovation

A relentless drive to improve on the status quo of high value pump installations. Intrax has a culture of market disruption bringing value to customers, ranging from small, yet significant, product modifications which address regional challenges, to in-depth R&D and new product designs



Designed with your industry in mind

Audex are respected manufacturers of industrial submersible and dewatering pumps.

Our pumps have been specifically developed for use in the toughest and most abrasive of applications and environments. Trusted by operators of quarries, mines and recycling facilities, Audex pumps represent quality and reliability giving you superior performance and reduced downtime. Pumps that suit your application better because they have been designed with your industry in mind.

Audex pumps are available in a range of sizes from 2" to 10" discharge, these robust pumps feature cast-iron and high chrome wear parts and agitators to maximize wear life when pumping abrasive liquids. Available on most of the larger submersible pumps is the seal fail detector system, which monitors moisture levels and shuts down the pump in the

event of seal wear or failure. This avoids costly rewinds and allows for a quick parts replacement without a costly full pump rebuild.

Audex also manufacture a range of pontoons to mount our pumps on when installing in a lagoon, and discharge units to monitor site discharge.

All this adds up to increased pump life and less pump related down-time even in the most stringent environments.

AUDEX

AW & AW Pro Range



AW 2-040



AW 3-075



AW Pro



AW 3 Inch

Industries & Applications

Audex AW and AW Pro are submersible pumps with agitators ideal for handling dirty water and slurry. They have been designed and built for use in the abrasive applications found on quarries, recycling plants and on ready mixed concrete sites. Reliable, industry-proven and affordable, the pumps offer exceptional service life with minimum running costs and repairs.

The Audex AW Range

The Audex AW 2-040 (2") and the AW 3-075 (3") submersible dewatering pumps are predominantly used as contractor pumps for site drainage duties, for example where the water contains sand and silt in suspension. A ductile iron vortex impeller is fitted to both models, which enables solids handling and offers excellent wear resistance. A built-in shaft

mounted agitator keeps the solids in suspension and minimises clogging.

The larger Audex AW pumps, 2-150 to 8-2200, are heavy-duty submersible slurry pumps ideal for the harsh conditions found in heavy industries such as quarries or recycling plants. They have a top discharge enabling installation in confined spaces. They come with cast-iron impeller and wear plates for increased lifetime, and a cast-iron agitator for smoother pumping of solids-laden fluids.

The Audex AW Pro Range

The Audex AW Pro range consists of four dirty water pumps - the 2-150 TA, the 2-220 TA, 3-370 TA and the 4-370 TA. The AW Pro range includes all of the features of the standard AW range plus an intelligent control system (ICS) giving you complete protection for your pump.



AW 4 Inch



AW 6 Inch



AW 8 Inch

AW Pro Features & Benefits

Audex AW Pro pumps will not run if they are wired up incorrectly. This prevents damage to mechanical seals and the impeller which can result from running backwards.

The pump turns off if:

- A phase goes down from the power supply
- The motor is overloaded
- The impeller gets jammed
- Incorrect voltage is sensed

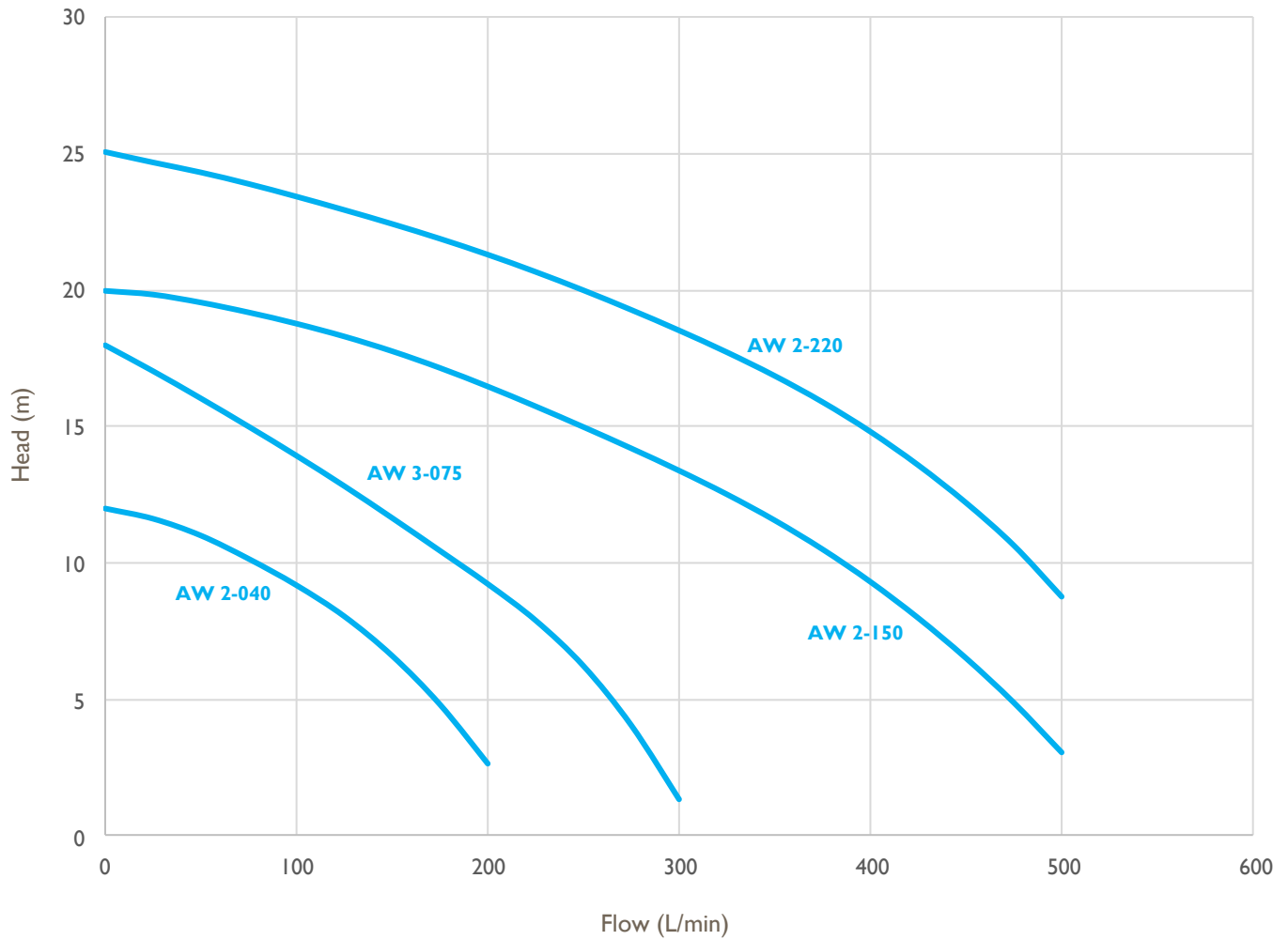
This prevents the motor from burning out and prevents mechanical damage to the pump.

The pump will try to restart after five minutes – if the problem still persists it will wait another five minutes before trying again.

Audex AW Pro pumps feature an automatic level control. This prevents damage to the pump from running dry, takes away the need for a control panel and saves power as the pump only runs when it needs to. There is a 60 second time lag from when the level sensor is activated. This is to prevent a false start and reduce the amount of times the motor starts/stops

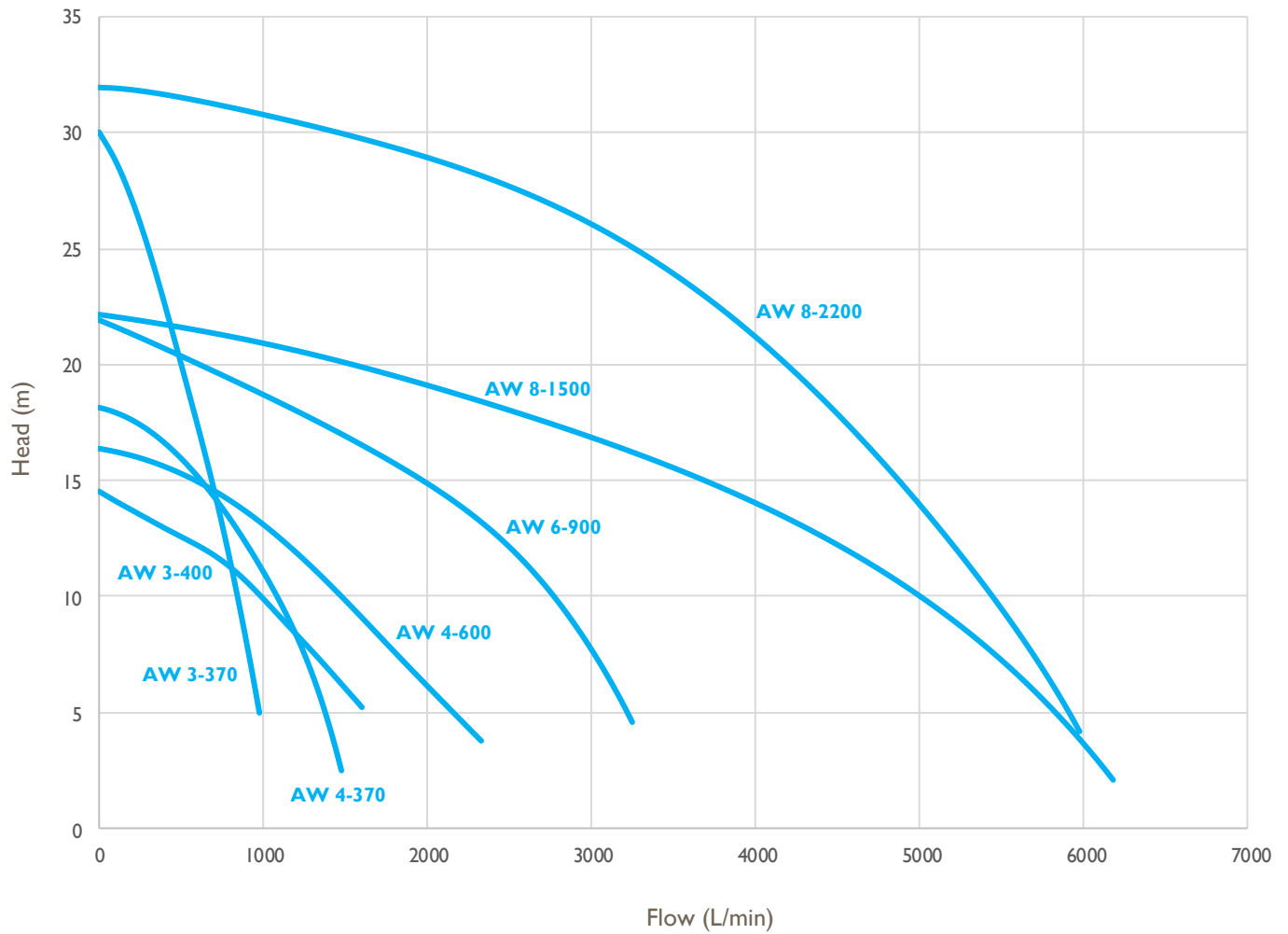
The pump also stores malfunction history. This allows for correct diagnostics if the pump fails and helps with future preventative action.

Audex AW and AW Pro Technical Specification



Part Code	Audex Model	Motor kW	Motor V	Rated Current Amps	Strainer Size mm	Max Head m	Max Flow L/min	Max Dimensions mm	Net Weight kg
P10038	AW 2-040 SA with Float	0.4	110	5	6	12	210	405 x 255 x 255	13.5
P10037	AW 2-040 SM	0.4	110	5	6	12	210	405 x 255 x 255	13.5
P10040	AW 2-040 VA with Float	0.4	230	3	6	12	210	405 x 255 x 255	13.5
P10039	AW 2-040 VM	0.4	230	3	6	12	210	405 x 255 x 255	13.5
P10041	AW 2-040 TM	0.4	415	1.1	6	12	210	405 x 255 x 255	13.5
P10043	AW 3-075 SA with Float	0.75	110	10	6	17	300	445 x 295 x 255	18
P10042	AW 3-075 SM	0.75	110	10	6	17	300	445 x 295 x 255	18
P10045	AW 3-075 VA with Float	0.75	230	5.4	6	17	300	445 x 295 x 255	18
P10044	AW 3-075 VM	0.75	230	5.4	6	17	300	445 x 295 x 255	18
P10046	AW 3-075 TM	0.75	415	1.7	6	17	300	445 x 295 x 255	18
P12864	AW 2-150 VC	1.5	230	3.5	10	20	500	610 x 265 x 265	37
P11707	AW 2-150 TC	1.5	415	3.5	10	20	500	610 x 265 x 265	37
P11708	AW 2-220 TC	2.2	415	5	10	24	500	610 x 265 x 265	40

Audex AW and AW Pro Technical Specification



Part Code	Audex Model	Motor kW	Motor V	Rated Current Amps	Strainer Size mm	Max Head m	Max Flow L/min	Max Dimensions mm	Net Weight kg
P13367	AW Pro 2-150 TA	1.5	415	3.5	10	20	500	680 x 265 x 265	43
P13465	AW Pro 2-220 TA	2.2	415	5	10	25	500	680 x 265 x 265	46
P13466	AW Pro 3-370 TA	3.7	415	7.7	10	30	1000	770 x 320 x 295	72
P13467	AW Pro 4-370 TA	3.7	415	7.7	10	18	1500	770 x 320 x 295	73
P13232	AW 3-400 TC	4	415	10.2	30	14.8	1650	885 x 385 x 395	108.5
P13233	AW 4-600 TC	6	415	13.8	30	16.9	2400	470 x 410 x 985	141
P13234	AW 6-900 TC	9	415	19.5	30	21.5	3200	470 x 470 x 1045	171
P13235	AW 8-1500 TC	15	415	30.1	30	22	6200	540 x 500 x 1220	260
P13236	AW 8-2200 TC	22	415	42	30	32	6000	740 x 570 x 1460	408

AUDEX

AS Range



AS 2 & 3 Inch



AS 4 Inch



AS 6 Inch

Industries and Applications

The Audex AS range of submersible pumps are predominantly used in quarrying for general duties such as handling dirty water or wash-plant feed. AS pumps are additionally used in mining, civil engineering and construction.

Audex AS models with a power rating ranging from 22kW to 75kW are also suitable for pre-dewatering of deep wells and high head dewatering.

Pump Performance

Audex AS pumps provide you with a highly reliable and efficient solution with minimal running costs and repairs. Along with a rugged build utilising wear-resistant materials, they offer an impressive performance: achieving a discharge of up to 16,000 litres/minute with a head of up to 130m.

Build and Design

Reliable, industry-proven and affordable, Audex AS pumps are available in a range of sizes, from 3" to 10" discharge. This durable range of pumps have cast-iron bodies and motors, while their mechanical seals are resistant to high pressures, allowing the pumps to be deeply submerged. A semi-open impeller made from high chrome and ductile-iron wear plate improve durability. The pump motors are hermetically sealed.

The AS 10-5500 TR has an outer casing made of epoxy coated steel and features nitrile rubber lined diffuser/wear plate.

All AS pumps have a top outlet allowing the user to submerge the pump in a confined area if needs be, while the pumps are fitted with lifting eyes for quick and easy deployment and suspension.



AS 8 Inch



AS 10 Inch

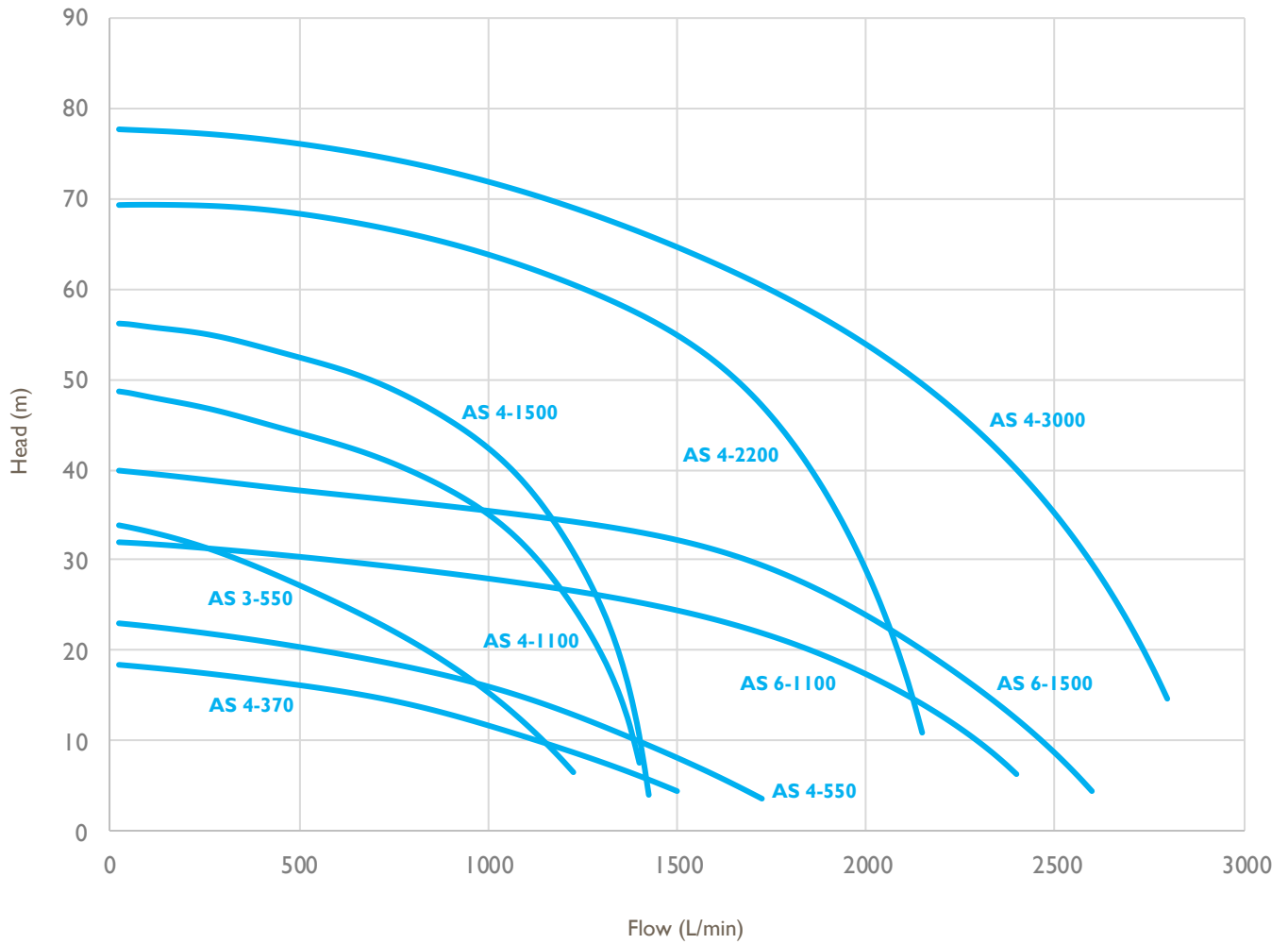
Audex Seal Protection Device

Available on most of the larger AS pumps is the Audex Seal Protection Device, which monitors moisture levels and shuts down the pump in the event of seal wear or failure. This avoids costly rewinds and allows for a quick parts replacement without a costly full pump rebuild.

The Audex Seal Protection Device can be installed in any control panel and turns the pump off as soon as it senses any moisture behind the first seal. The red light indicates a seal failure and the pump is automatically turned off. This removes the risk of the second seal failing and the motor burning out which would clearly result in a costly pump rebuild. This means you only have to replace a low cost seal rather than expend thousands on a new pump or refurbishment. The pump is only likely to be out of action for a matter of hours over against the possibilities of a long and costly repair project or long lead time on a new pump.



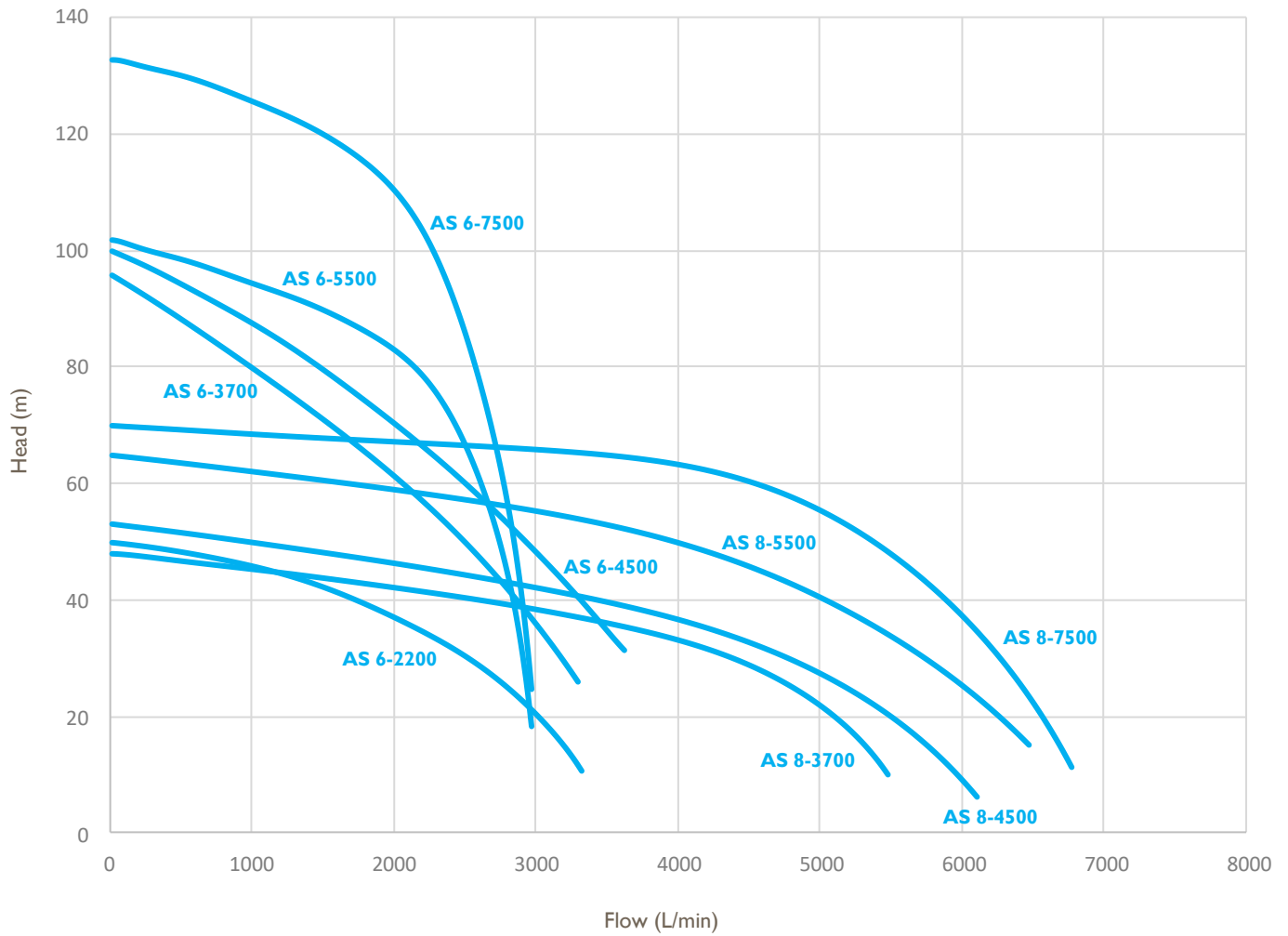
Audex AS Range Technical Specification



Part Code	Audex Model	Motor kW	Motor V	Rated Current Amps	Strainer Size mm	Max Head m	Max Flow L/min	Max Dimensions mm	Net Weight kg
P14189	AS 2-220 TC *	2.2	415	5	8.5	26	550	610 x 265 x 265	39
P14190	AS 3-550 TC	5.5	415	11.4	8.5	34	1250	750 x 350 x 360	77
P14197	AS 4-370 TC	3.7	415	7.7	8.5	18.5	1500	710 x 320 x 295	63
P14192	AS 4-550 TC	5.5	415	11.4	8.5	23	1750	750 x 350 x 360	77
P14191	AS 4-1100 TC	11	415	22	11.5	48.5	1400	885 x 415 x 435	136
P14198	AS 4-1500 TC	15	415	29.5	11.5	56	1400	935 x 415 x 435	158
P13198	AS 4-2200 TC	22	415	41.5	6	68	2166	1490 x 490 x 720	370
P13199	AS 4-3000 TC	30	415	54	6	78	2833	1490 x 490 x 720	375
P14193	AS 6-1100 TC	11	415	22	19.5	32	2450	885 x 415 x 435	139
P14194	AS 6-1500 TC	15	415	29.5	19.5	40	2600	935 x 415 x 435	146

* Not featured on the above table of curves. Please refer to the AS 2-220 TC data sheet for this curve

Audex AS Range Technical Specification



Part Code	Audex Model	Motor kW	Motor V	Rated Current Amps	Strainer Size mm	Max Head m	Max Flow L/min	Max Dimensions mm	Net Weight kg
P13676	AS 6-2200 TC	22	415	41.5	15	50	3333	1560 x 490 x 720	385
P13200	AS 6-3700 TC	37	415	66	6	83	3666	1550 x 600 x 870	570
P13201	AS 6-4500 TC	45	415	80	6	90	3666	1550 x 600 x 870	575
P13832	AS 6-5500 TC	55	415	98	8	105	3200	1760 x 620 x 940	830
P14196	AS 6-7500 TC	75	415	132	8	130	3300	1760 x 620 x 940	830
P13202	AS 8-3700 TC	37	415	66	20	48	5500	1600 x 600 x 870	575
P13203	AS 8-4500 TC	45	415	80	20	53	6200	1550 x 600 x 870	580
P13468	AS 8-5500 TC	55	415	98	20	65	5500	1810 x 620 x 940	880
P13469	AS 8-7500 TC	75	415	132	20	70	6500	1810 x 620 x 940	880
P10036	AS 10-5500 TR *	55	415	105	15x45	34	16000	1538 x 776	700

* Not featured on the above table of curves. Please refer to the AS 10-5500 TR data sheet for this curve

Designed with your industry in mind...



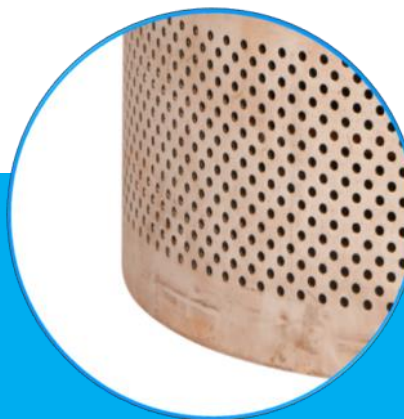
Outlet

A top outlet allows the user to submerge the pump in a confined area.



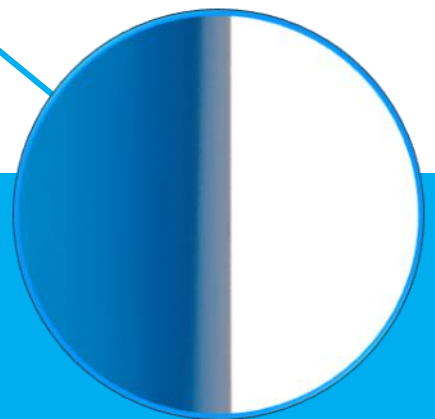
Lifting Eyes

Heavy duty lifting eyes such as the ones shown on this Audex AS pump allow for easy lifting and for it to be suspended.



Strainer

Ranging from 6mm to 30mm depending on model.



Body

Heavy duty cast iron or steel body and motor for long lasting durability.



Agitator

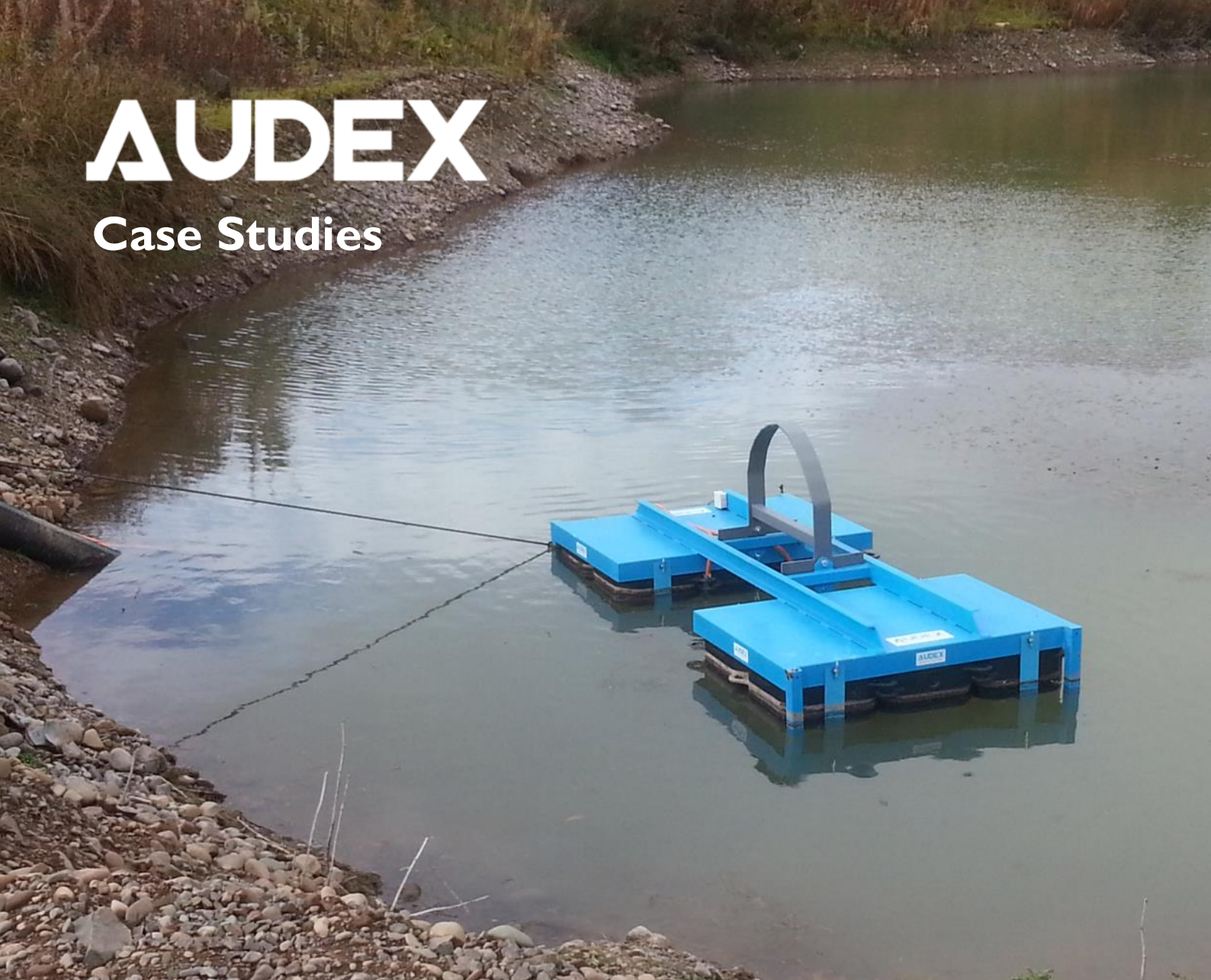
High chrome agitators and alloy impellers, ideal for pumping heavy slurry, are standard on all Audex AW pumps.

AUDEX

INDUSTRIAL DEWATERING

AUDEX

Case Studies



Pontoons

Audex are able to offer a range of pontoons to suit various types of centrifugal and slurry pumps.

The pontoons are made to order to suit the customers exact requirements and specification. They consist of a heavy duty mild steel structure which are supported by patented blow moulded plastic buoyancy sections.

The buoyancy sections offer impressive payloads and are extremely hard wearing and robust whilst the flexible design allows the option of mounting pumps in various ways to suit all pumping applications.

Huge savings with Audex pumps and pontoons

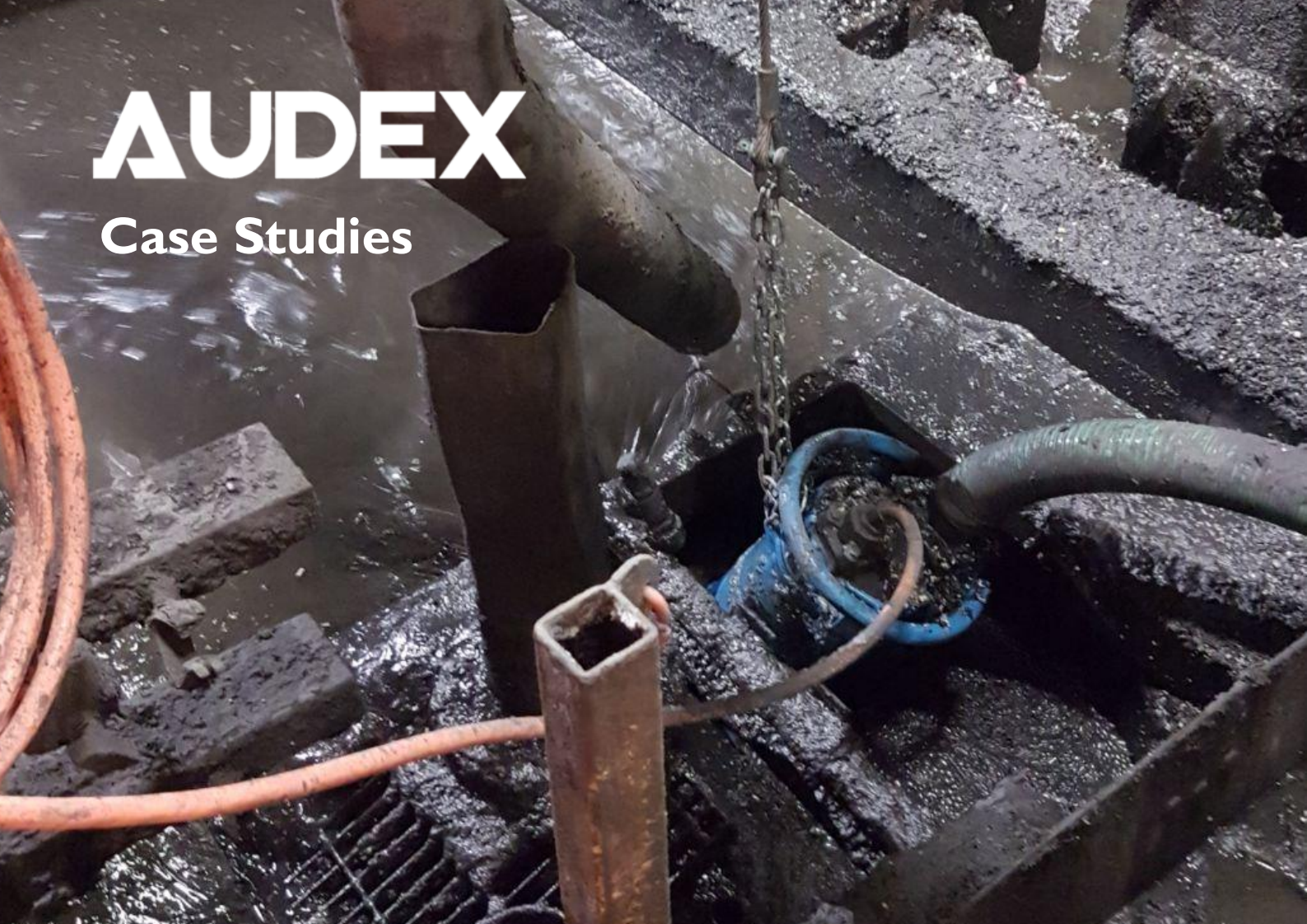
Audex manufacturers' Atlantic Pumps produced two pontoons for a quarry in southern Scotland with each holding an 8" Audex submersible pump.

Following installation, the delighted Quarry Manager contacted Atlantic regarding the outstanding saving he's made. 'I've done some rough initial calculations, the pump that runs to top up the plant pond will save us a minimum of £8000 a year on diesel. Well happy with that.'

The Atlantic team were also delighted with the saving and at the project as a whole. 'From placing the order to point of delivery only took 2-3 weeks and that includes the building of the two pontoons' said Sales Advisor, Mark McCreadie. 'I, along with the rest of the team thoroughly enjoyed working on this job and we're really keen to help other quarries make such huge savings'.

AUDEX

Case Studies



Long-lasting AW pump radically helps conveyor pit cleaning

Cleaning out the materials that have spilt into the conveyor pit is an issue faced by ready-mix sites globally. It is an essential but often awkward task that involves downtime, out-of-hours working and lost production plus potential health and safety issues. One Tarmac site addressed this problem with Audex manufacturers, Atlantic Pumps in a very successful way.

Rather than shoveling out the bottom of the pit, the site introduced a high pressure hose and an Audex AW 3-400 submersible pump. A single operator added water to the collected sand spillages and the AW pump disposed of the sand-laden water with ease. The introduction of this method removed the need for any shoveling and cut the time to complete the task by half, resulting in a clean and tidy conveyor pit and a more productive plant.

At the time of writing, despite being used several times a week, the pump has been operational and maintenance free for over two years.

Wash plant pit transformed thanks to the introduction of an AW 4-600

An Oxfordshire quarry had been experiencing problems for over two years with the vertical pump that they had installed under their wash plant, with staff having to regularly enter and clear the pit and replace parts.

A visit by Atlantic Pumps found that the fluid was not being agitated in the sump and due to the design, was difficult to install a stirrer. Atlantic recommended installation of an Audex AW 4-600.

The pump has inbuilt agitators which helps break up solids and are also much easier to install. Featuring a 4-pole motor for an increased lifetime, the impeller wear plate and agitator are made from high-chrome for ultimate wear-life.

Replacing the vertical pump with the Audex AW 4-600 radically transformed the wash plant pit. Staff also no longer had to enter the pit, thus reducing site downtime and providing a cleaner and safer working environment.



Audex triumphs as Tarmac quarry establishes emergency flood system

Many hard rock quarries drain naturally however the quarry that this case study focuses on doesn't, therefore the quarry was recycling a lot of water from around the site. The site was made aware by the Environment Agency that were they to experience a Superstorm – an event that takes place on average every five years and that the quarry would be unable to stop large quantities of water from entering a nearby brook, thus polluting the environment. Discharging dirty water into the dike could potentially result in a fine that could run into hundreds of thousands of pounds. The quarry therefore needed to put a system in place for an emergency flooding situation.

In recent years the site had experienced increased costs relating to pumps and product quality issues. They trialed Audex pumps in early 2015 and were very impressed with the quality and have since gone on to purchase further Audex pumps from Atlantic. With this in mind Atlantic Pumps were invited to present a solution.

Atlantic specified three 6" Audex submersibles to handle the task while another company specified one large submersible. Site management preferred the Audex option as it was more flexible; the other pumps could be used as spares elsewhere on site. When they're needed, the pumps could simply be dropped onto the storm relief project. The rival plan would see a £40k pump possibly remaining unused on-site for years at a time.

Tarmac's final decision was to purchase Audex pumps as they're built for the quarrying and mining market and, from their experience, the pumps lasted longer and were able to cope with dirty water. Choosing Audex pumps also meant a more cost effective solution, less hassle and less downtime. Atlantic Pumps fitted each of the pumps with an Audex Seal Protection Device (see page 9).

At the time of writing, the client remains satisfied with the solution put in place and the performance of their Audex submersible pumps.



AUDEX

Unit 21 Prospect House
Colliery Close, Staveley, Chesterfield
United Kingdom, S43 3QE

w: audexpumps.com
e: info@intraxglobal.com
t: +44 (0)1246 284 420

Atlantic Pumps Ltd is a Limited Company registered in England no. 09400148. Registered Office: Atlantic Pumps, Unit 21 Prospect House, Colliery Close, Staveley, Derbyshire, United Kingdom, S43 3QE. Audex is part of the Intrax Global Group. 172020.

AUDEX
INDUSTRIAL DEWATERING