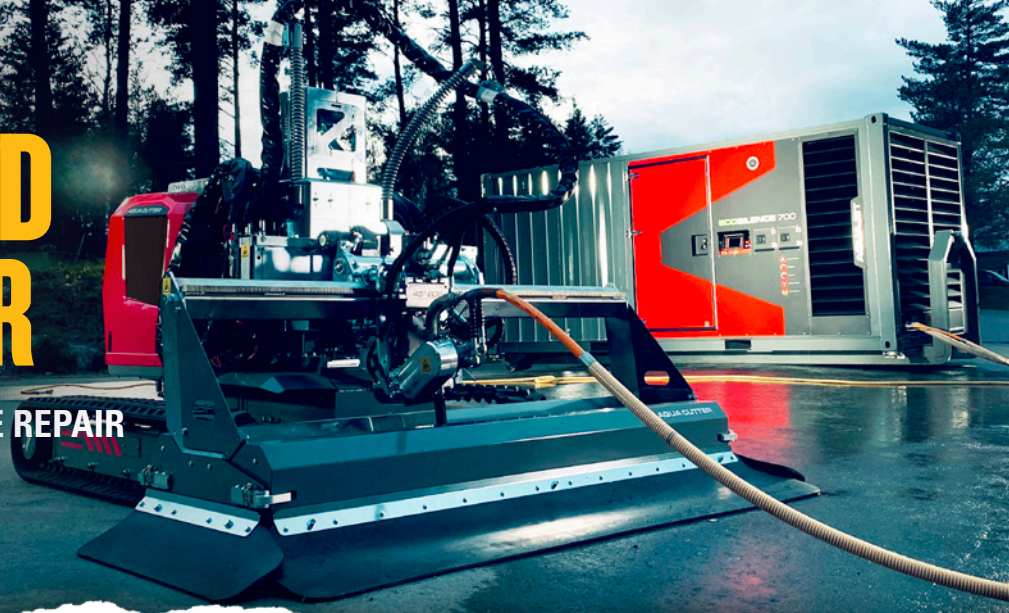


AQUAJET AND CATERPILLAR

ARE CHANGING INFRASTRUCTURE REPAIR



AQUAJET

CUSTOMER:

AQUAJET

PRODUCT:

Aqua Power Pack 700

LOCATION:

Sweden

SCOPE OF ENGINE USE:

Cat® C18 EU Stage V Engine

CAT DEALER:

Zeppelin

FEATURED TOPICS:

Cat C18 EU Stage V Engine

Most of the concrete bridges, harbors, parking ramps and highways of the world were built more than a half-century ago. Infrastructure needs repair, and the work is expensive and challenging. Aquajet specializes in innovative hydrodemolition systems that help with concrete removal and repair. Renovation of these massive structures is much more economical than demolition.

Aquajet was founded by the Hilmerssom family 40 years ago to create solutions for bridge repair in Sweden. While the majority of its customers are based in the US, the global company is constantly growing with more than 100 projects a year around the world.

HYDRODEMOLITION IS CHANGING THE INDUSTRY

Aquajet hydrodemolition equipment makes it safer to perform concrete infrastructure renovations. Aqua Cutter robots maintain a preset distance between the nozzle and surface, ensuring no loss of demolition power. Aqua Power Pack high-pressure pump systems like the Aqua Power Pack 700 provide hydrodemolition power for robots. Partial depth concrete removal is precise, preserving rebar and the remaining structure. The method also helps avoid microcracks. Repairs can extend the life of concrete structures by up to three times.

What makes the Aqua Power Pack 700 pump so unique and versatile is a feature called Ecosilence® for quiet operation. “Many times, a pump will be in a parking garage, standing outside of a village, and it has to be silent,” says Aquajet CEO Roger Simonsson. “We are the only ones who have a silent pump.”

MAXIMIZING PRODUCTION AND SUSTAINABILITY

Downtime in infrastructure repair is a major obstacle. “Before, workers did manual labor with jackhammers,” says Simonsson. “Hydrodemolition is safer, faster and more economical.”

The Aqua Power Pack 700 pump uses a lot of water. Aquajet wanted to make the machines as efficient as possible, so it developed EcoClear, a water treatment method that cleans the water as it’s used. “Not wasting water is very important for the future,” says Simonsson. “When you talk about water consumption, this technology will be a big thing moving forward.” Aquajet has the only fully automatic water filtration system in the market.



POWER PROFILE: CHANGING INFRASTRUCTURE REPAIR

A POWERFUL ENGINE TO CHANGE FOUNDATIONS

Aquajet chose the [Cat® C18 EU Stage V engine](#) for its Aqua Power Pack 700 machines due to the engine's compact size and high power density. "We needed an engine that could handle constant RPM for eight-to-ten hours," says Simonsson. "Repair projects can take weeks. These engines must also perform in a wide variety of conditions, including in freezing water."

Aqua Power Pack 700 pumps have their own heating exchange systems and don't use fans. This called for a complicated engine configuration. Because the Aqua Power Pack 700 is built to hold pumps, controls and water transfer apparatus, there isn't a lot of room for an engine in

the design. The size and power capacity of the Cat C18 was the perfect fit for the Aqua Power Pack 700. Customers trust Cat engines. Simonsson says, "We like to work with the best because we are the best."

The Cat dealer network is important to Aquajet because customers can easily find solutions to potential problems. "It's important to have a good relationship with each market," says Simonsson. "When we deliver a pump anywhere around the world, we first meet with our Cat dealer because they have all the information we need."

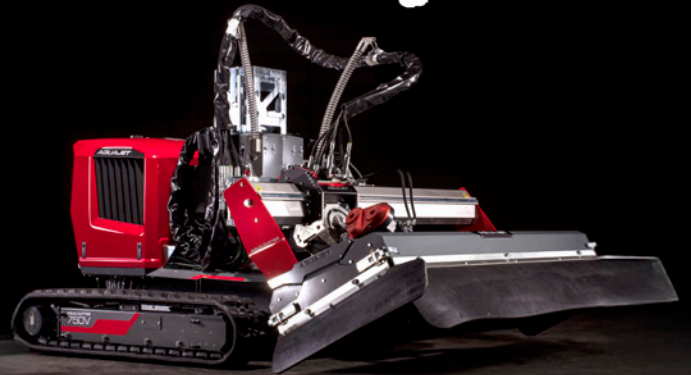
A HELPFUL ALLY IN ZEPPELIN

Designing and manufacturing a quiet, yet sophisticated machine like the Aqua Power Pack 700 was a challenge, and there were a lot of bumps in the road along with the way. [Zeppelin, Aquajet's Cat dealer](#), was instrumental in the process. "We had some issues at the start, but Zeppelin offered great support," says Simonsson. "One thing that they have been very keen on, that is to have stock-up product to help

us meet lead times and have machines in stock. This has helped us to gain market share."

"It's been very interesting to follow the development of this machine," says Zeppelin Key Account Manager Richard Liljeblad. "Aquajet has made some really amazing developments when it comes to keeping the machine as quiet as possible."

"We like to work with the best because we are the best."



THE WORK DOESN'T END WHEN A SALE IS MADE

Reputation means everything for a small company that achieves big results. Aquajet works closely with each of its customers to ensure they get the most out of the pumps they purchase. "We are very close to

our customers," says Simonsson. "We know our machines inside and out. We continue training customers for years to help them streamline jobs and be as efficient with our machines as possible."