



## Heritage Cooperative Six-Day Continuous Concrete Pour

With extraordinary preparation, a highly skilled crew and trusted partners, a lot can be accomplished in just one week. Take a look at the progressions photos as **500 truck-loads of concrete** became a 14-story grain silo during a six-day continuous pour.



### Day Zero – Ready to start a 146-hour work week!

The slip form method used on the Heritage Cooperative grain silo pour is a self-contained formwork system that is raised vertically in a continuous process during the concrete pour. Fresh concrete is pumped continuously to the top of the structure as the slip form slowly rises.



**Day One - 12 hours into the first day of the continuous pour.**

A specialty concrete crew of 190 workers in two shifts of 95 workers each worked around the clock to complete the pour. Ohio Ready Mix added a night shift in order to supply 500 truckloads of concrete from their Marysville plant.



**Day Two – 24 hours down, 5 days to go.**

Once a continuous concrete pour has begun there is limited flexibility for change. To facilitate adjustments to the concrete mix, the concrete supplier established an on-site computer that could control the mix at the concrete plant.



### **Day 3 at sunrise.**

During the Heritage Cooperative grain silo pour, two pump trucks were on site throughout the pour. One pump truck was used for the pour and the second truck was a backup in case the first one went down.



### **Day 4 sunrise – at the halfway point.**

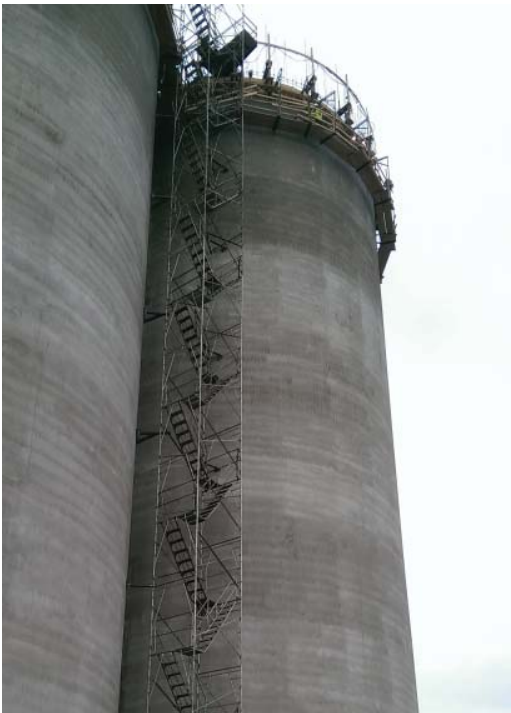
To ensure that the 657 tons of rebar needed for the grain silos would be available as needed, deliveries were made throughout the six-day pour but rebar was also staged onsite. In addition, the steel supplier was on standby to make special deliveries if needed.



**Day 5 – GCI provided field services 24/7 throughout the project.**

GCI's Construction Materials Engineering and Testing (CoMET) services included:

- Constant monitoring of the concrete setting rate to ensure that it matched the speed at which the forms were rising
- Strength testing of the concrete walls to ensure stability was achieved
- Steel inspections of the new rebar sections that were being placed as the forms moved upward.



**Day 6 morning – the climb to the work area is getting longer.**

When a shift of workers went up, they never came back down until their 12-hour shift was over.



**Day 6 evening**

Just one more 12-hour shift to go.



**146 hours later – the continuous pour is finished!**

Eight connected grain silos 140 feet tall will hold 1.5 million bushels of grain which is approximately 1,500 large semi-truck trailer loads.

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## **GCI Adds Field Water Spray Testing Service**

With an ever-increasing focus on energy efficiency and LEED building construction, most construction specifications now require water infiltration testing of building envelopes and glazing systems. The impact of water intrusion can result in mold issues, reduced indoor air quality and even structural decay. Leaky windows also increase a building's operating cost.

GCI's field services department now offers "Field Water Spray Testing" in accordance with AAMA 501.2. The hose nozzle test is the most commonly specified new construction field test for installed storefront and curtainwall systems. This test allows for rapid quality assurance testing and is also a useful tool to identify failure points when a water penetration occurs.

For more information, contact GCI's Bob Hiles at 614-895-1400.



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## **\$20 Million Service Station Cleanup Fund Now Available**

The Ohio legislature approved creation of a new \$20 million Service Station Cleanup Fund as part of the Ohio Development Services Agency's 2016-17 operating budget.

The Abandoned Gas Station Cleanup Grant Program is established for the purpose of cleanup and remediation of Class C release sites to provide for and enable the environmentally safe and productive reuse of the site. A property owner or political subdivision may apply directly for:



- Up to \$100,000 may be granted for property assessment and sampling.
- Up to \$500,000 may be granted to a property owner for cleanup or remediation.

The available funds are likely to go quickly, so act now if you have a site that meets the parameters. For assistance with your funding application or environmental assessment, contact Bruce Savage, Principal/Director Environmental Services at (614) 895.1400 or [bsavage@gci2000.com](mailto:bsavage@gci2000.com).

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## **New Dayton Office Location & Phone**

GCI's Dayton office has relocated to:

Geotechnical Consultants, Inc.  
2380 Bellbrook Avenue  
Xenia, Ohio 45385

The new Dayton office phone number is 937.736.2053.

For all office locations visit [www.gci2000.com](http://www.gci2000.com).

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