

FACT SHEET

Yellow River Water Reclamation Facility Modernization



WHAT ARE THE FACTS ABOUT BLASTING?

Will blasting be necessary during this project?

Yes, controlled blasting will be used in specific areas to remove rock during construction of the Yellow River WRF modernization project. Blasting is safely used daily in construction throughout the world. It is the most cost-effective method for breaking rock and helps lower costs to the owners, taxpayers, businesses and contractors. Rock excavation by blasting takes a fraction of the time required by conventional earth-moving equipment, so reduces the time span for construction.

What happens during a blast?

Although people often envision dramatic images, most blasts are actually relatively low-key. More than 90% of the explosive's energy is used in breaking the rock. The rest of the energy goes into the ground or air as vibrations and noise. The ground vibrations travel outward and away from the blast in the same way that dropping a pebble in a pond of water generates ripples. These vibrations cannot be seen but may be felt. The vibrations decrease as they travel away from the energy source, and are about the height of the thickness of a single sheet of paper by the time they reach neighboring structures. Underground structures (wells, pools, pipelines and septic tanks) are even less likely to be affected by vibrations than above ground structures.

How do people respond to a blast?

The response of individuals to blasting vibration will vary from person to person. Some people can feel extremely low levels of vibration, which are many times lower than those required to damage a structure. In fact, people are more sensitive to vibrations than are the structures they occupy. The vibrations will be felt less when one is outside rather than inside, standing rather than sitting or lying down. If you are talking, walking or busy around the house, the vibration will be less noticeable than if you are sitting with a cup of coffee. Vibrations that are accompanied by noise will appear to be stronger than the same vibration would be without noise. Human activities such as walking, door slamming, closing windows or children running through the house can stress individual building components more so than safe blasting levels.

How will the blasting be monitored?

The only accurate method to measure vibration intensity is with a seismograph used to measure vibrations from blasting to make sure they remain within specified limits. Seismographs will be placed at locations close to the blast in order to provide measurements that indicate the severity of the blast and which allow for adjustments to be made in future blasts if necessary. The results obtained from the seismographs may be used to estimate the severity of the vibrations at locations further away. **(continued on back)**



WHAT ARE THE FACTS ABOUT BLASTING?

How are blasting activities regulated in Georgia?

The Georgia Blasting Standards Act regulates blasting operations. Gwinnett County DWR requires that contractors fully comply with this Act. The Act specifies limits on the severity of vibrations at your home caused by blasting. You may view these regulations at <http://www.ganet.org/cgi-bin/pub/ocode/ocgsearch?number=25-8-1>, or use the contact information at the bottom of this Fact Sheet to obtain a copy by mail.

What assurance do I have that my home will be protected during blasting?

The construction contractors are required to have a pre-blast survey done by a qualified technician furnished by the insurance underwriter. The pre-blast survey documents by notes and photographs the condition of structures within 500 feet of the site perimeter, prior to any blasting occurring. If a property owner reports damage, then a post-blast survey will be conducted of the reported damage and will be compared to the pre-blast survey.

If the analysis shows that the blasting did damage my home, how will I be reimbursed?

This process will work through the individual contractor's insurance providers and will depend on their claims procedures. DWR will impress upon all contractors the importance of getting such matters processed quickly and efficiently.

Will I be notified prior to blasting work beginning?

Before any blasting work begins, specific neighborhoods will be notified of the general timeframe that blasting will be ongoing. In cases where pre-blast surveys are provided, this will be in the form of a certified letter a week or more in advance. Door hangers may also be used at times, and information will be posted on the project website, www.yellowriverwrf.com

Who can I contact if I have additional questions?

Ken Fraker is DWR's project manager, and you may reach him at 678-318-2404 or Kenneth.Fraker@gwinnettcountry.com.