

## 20th Street and Factor Water Quality Assurance Revolving Fund Site - November 2012

*This fact sheet is a publication of the Arizona Department of Environmental Quality (ADEQ) to inform community members near the 20th Street and Factor Water Quality Assurance Revolving Fund (WQARF) site of current site activities in Yuma County.*

*If you receive your drinking water from the City of Yuma, your current drinking water is not affected by the groundwater contamination at the site.*

*A glossary of terms is located at the end of this fact sheet.*

### **SITE HISTORY AND INVESTIGATION**

The 20th and Factor WQARF site is located in the eastern portion of the City of Yuma, Arizona, and is generally bounded to the north by 17th Street, to the south by 21st Street, to the west by 4th Avenue, and to the east by Kennedy Lane (Figure 1, page 4). The site consists of the Houston International facility, and the area of groundwater contamination northwest of the facility. The site is located in an urban setting that includes a mixture of commercial businesses, light industrial, warehouses, and residential neighborhoods.

The property was undeveloped land prior to early 1965. From 1966 to 1995, the property was occupied by Houston Photo Products, Inc. (aka Houston International, Ltd. and Houston Fearless 76, Inc.), a film processing operation and manufacture of film-processing machines. Wastewater resulting from film development and/or processes associated with film-processing machine manufacturing was discharged directly and/or indirectly to the ground via five wastewater disposal systems. Chemicals of concern (COC) contained in the wastewater included the volatile organic compounds (VOCs) tetrachloroethene (PCE), and trichloroethene (TCE) as well as cyanide compounds.

In 1993, the Houston International facility and the ADEQ Hazardous Waste Section entered into a compliance order. The facility conducted additional soil and groundwater investigations under the compliance order. Also in 1993, Houston International moved its motion picture laboratory operation off-site. The facility is currently occupied

by the offices of Houston Film Labs, a warehouse and rented business space. These operations do not generate wastewater.

The site was placed on the WQARF registry in March 2000. In 2001, ADEQ completed the characterization of cyanide-contaminated soils at the facility. In 2002, ADEQ completed an Early Response Action (ERA) which included excavation and disposal of the upper foot of cyanide-contaminated surface soils. Approximately 1,700 tons of contaminated soils were removed from the facility. A one-foot cap of aggregate base coarse material was placed over the remaining cyanide-contaminated soils. This cap helps prevent direct exposure to the underlying contaminated soils remaining at the site. The ERA also included the removal of two unused sumps and the cleaning of three active septic systems at the facility. Approximately 15,000 gallons of PCE and cyanide-contaminated wastewater and sludge were removed from the disposal system during cleaning operations. The removal of this source material addressed a continuing source of groundwater contamination.

Since the removal, ADEQ has continued to characterize the site gathering soil, soil gas, groundwater and indoor and ambient air samples.

Groundwater in this area is generally found at depths ranging from 75 feet to 80 feet below the ground surface. Based on historic and recent data collected from the site, groundwater flow is to the northwest.

### **WHAT ARE THE HEALTH RISKS ASSOCIATED WITH THIS CONTAMINATION?**

There are no known drinking water production wells within the boundaries of the site. The drinking water supplied by the City of Yuma meets all federal and state drinking water standards.

People who drink water containing PCE, TCE, or cyanide in excess of the regulatory levels over many years could experience problems with their liver and may have an increased risk of cancer. The contaminated groundwater in this area is not used for drinking water. The listing of the site on the WQARF Registry does not necessarily represent a

determination that the release of a hazardous substance at the site poses a threat to human health or the environment.

In 2005 and 2006, ADEQ conducted soil vapor intrusion modeling and an indoor air risk assessment evaluation to assess potential health risks to employees and visitors to the facility. This incremental risk was within ADEQ's acceptable cumulative excess cancer risk.

### **WHAT ARE ADEQ'S FUTURE PLANS AT THIS SITE?**

ADEQ's current plans for the site are to begin the remedial investigation (RI) phase of the project. Most, if not all, of the site characterization work is completed at the site. ADEQ will consolidate all the existing site characterization data, combined with a study of land and water uses in the area, into an RI Report. The site will then proceed through a feasibility study (FS) that will analyze potential cleanup methods for achieving the cleanup goals determined during the RI.

### **WHAT ARE THE CONTAMINANTS AT THIS SITE?**

Groundwater at the site is contaminated with PCE, TCE and cyanide. PCE is a man-made solvent which was used to clean machine parts at the facility. PCE is present in the groundwater at levels that exceed the Arizona Aquifer Water Quality Standards (AWQS) of 5 micrograms per liter ( $\mu\text{g/L}$ ). TCE is a breakdown product of PCE, and is also present at the site in groundwater at levels exceeding the AWQS of 5  $\mu\text{g/L}$ . Cyanide is a chemical that was used at the facility as part of the film processing. Cyanide is also present in groundwater at levels that exceed the AWQS of 0.2 milligrams per liter (mg/L) for free or amenable cyanide.

### **PUBLIC INVOLVEMENT**

ADEQ will keep the public informed through fact sheets and public meetings. ADEQ is assembling a mailing list and Community Advisory Board (CAB) to advise ADEQ and the public of issues and concerns related to investigations and remediation of the site. The purpose of the CAB will be to:

- provide comments to ADEQ on the remedial investigation report, and other cleanup and investigation issues related to this site;
- represent a diversified cross-section of the community in and around the site;
- participate in outreach to the community;
- make site visits if desired.

### **CAB MEMBERS NEEDED**

ADEQ is currently looking for members of the public to serve on the CAB.

- Are you concerned about the environment and protecting public health?
- Do you live, work, own property or a business in the area of the site and/or are you interested in the site?
- Do you have a minimum of two hours a day for four times a year to volunteer?

If you answered yes to any of the questions and would like to apply to be a member of the CAB, please fill out and complete the enclosed application. For more information on community involvement activities at the site please call Delfina Olivarez, ADEQ Community Involvement Coordinator at (602) 771-4710 or 1-800-234-5677 Ext. 771-4710.

### **Scope of Work, Outline of Community Involvement Plan, and Fact Sheet**

*Availability Notice Pursuant to A.R.S. §49-287.03 (c) (d), ADEQ is announcing the availability of the scope of work, outline of a community involvement plan and fact sheet. A public meeting may be called to address any comments. To obtain copies, contact Delfina Olivarez at (602) 771-4710.*

### **INFORMATION REPOSITORY**

Within 24-hour notice, an appointment to review related documentation is available Monday through Friday from 8:30 a.m. to 4:30 p.m. at ADEQ Records Management Center, 1110 West Washington Street, Phoenix, Arizona. Please contact (602) 771-4389 to schedule an appointment to review these documents.

### **WHAT IS WQARF AND THE REGISTRY?**

The WQARF Program was established by Arizona law to:

- 1) conduct statewide surface and groundwater monitoring
- 2) study health effects
- 3) perform emergency remedial actions
- 4) conduct long-term remedial action programs

ADEQ established the WQARF Registry to include sites in Arizona where groundwater and/or soil contamination is present. Sites appearing on the WQARF Registry are managed by the WQARF Program for investigation and/or cleanup of contamination. Listing of the site on the WQARF Registry was due in part to the presence of PCE, TCE, and cyanide in the groundwater beneath the site.

## ADEQ CONTACTS

Scott Goodwin  
ADEQ Project Manager  
(602) 771- 4452 or toll free at (800) 234- 5677  
Ext. 771-4452.  
E-mail: [sdg@azdeq.gov](mailto:sdg@azdeq.gov)

Delfina Olivarez  
ADEQ Community Involvement Coordinator  
(602) 771- 4710 or toll free at (800) 234- 5677  
Ext. 771-4710.  
E-mail: [dco@azdeq.gov](mailto:dco@azdeq.gov)

Hearing impaired persons may call ADEQ's TDD line at (602) 771-4829.

For further information on this site or other WQARF sites, please visit the ADEQ Web site at: <http://www.azdeq.gov>. Click on Waste Programs, then click on Superfund/WQARF programs. Follow the links to get to the information that you need.

Para información en español sobre este sitio, comuníquese con Cecilia Montiel al (602) 771-4151.

## GLOSSARY

**Aquifer Water Quality Standard (AWQS)** - These are standards set to protect the quality of the water in aquifers for present and foreseeable uses, including consumption of the water by humans.

**Cleanup** – Actions taken that deal with a release or threats of a release of a hazardous substance that could affect people or the environment. The term “cleanup” is sometimes used interchangeably with the terms remedial action, removal action, response action, remedy, remediation, or corrective action.

**Contamination** - Any hazardous substance released into the environment.

**Cyanide** – Cyanide is a very poisonous chemical usually found joined with other chemicals to form compounds. Examples of simple cyanide compounds are hydrogen cyanide, sodium cyanide, and potassium cyanide. Cyanide and hydrogen cyanide are used in electroplating, metallurgy, production of chemicals, photographic development, making plastics, fumigating ships, and some mining processes.

**Early Response Action (ERA)** - Refers to a remedial action performed prior to the final remedy, and often prior to the remedial investigation. An ERA addresses current risks to public health, welfare, and the environment; protects or provides a supply of water; addresses sources of contamination; or controls or contains contamination where such actions are expected to reduce the scope or cost of the remedy needed at the site.

**Feasibility Study (FS)** - A process to identify a reference remedy and alternative remedies that appear to be capable of achieving the remedial objectives for the site. It is often done as part of a two-phase investigation in conjunction with a remedial investigation (RI/FS).

**Groundwater** - Water found beneath the earth's surface that fills pores between materials such as sand, clay, or gravel. In aquifers, groundwater occurs in sufficient quantities that it can be used for drinking water, irrigation, and other purposes.

**Remediation** – Actions taken to deal with the release of a hazardous substance that could affect people or the environment. Also see the term “cleanup”.

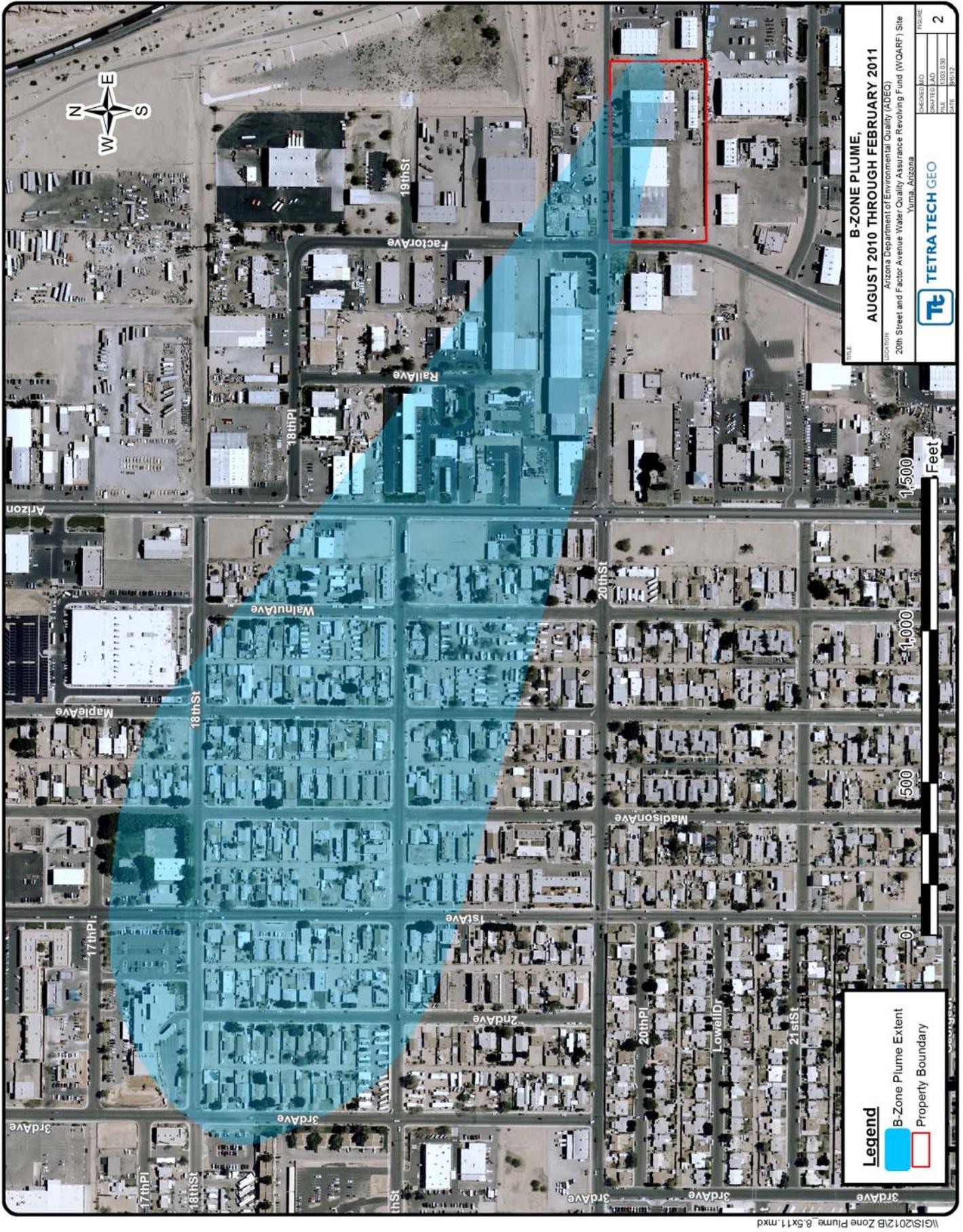
**Soil Vapor (Soil Gas)** - Gaseous elements and compounds that occur in the small spaces between soil particles. Such gases can move through or leave the soil depending on changes in concentrations or pressure.

**Tetrachloroethene (PCE)** - A clear, colorless, nonflammable solvent that readily evaporates at room temperature. PCE is widely used for dry cleaning of fabrics and degreasing/drying of metals.

**Trichloroethene (TCE)** - TCE is a nonflammable, colorless solvent that readily evaporates at room temperature. TCE is used mainly for degreasing/drying of metals and cleaning of fabrics.

**Volatile organic compounds (VOCs)** – A large group of carbon-containing chemicals that readily evaporate at room temperature. Examples of VOCs are isopropyl alcohol (rubbing alcohol), acetone (found in some nail polish removers), and the solvents PCE and trichloroethylene (TCE) (used in dry cleaning and metal degreasing).

**Water Quality Assurance Revolving Fund (WQARF)** - A program administered by ADEQ to (1) conduct statewide surface and groundwater monitoring; (2) study health effects; (3) perform emergency remedial actions; and (4) conduct long-term remedial action programs. Also known as “State Superfund Program.”



**Legend**

- B-Zone Plume Extent
- Property Boundary

**TETRA TECH GEO**

**B-ZONE PLUME,  
AUGUST 2010 THROUGH FEBRUARY 2011**

LOCATION:  
Arizona Department of Environmental Quality (ADEQ)  
20th Street and Factor Avenue Water Quality Assurance Revolving Fund (WQARF) Site  
Yuma, Arizona

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Figure 1



**Water Quality Assurance Revolving Fund Mailing List Form and Community Advisory Board (CAB) Membership Application**

**Fondo Rotativo para la Garantía de la Calidad del Agua Formulario para la Lista de Correo y Solicitud para Membresía en el Consejo Comunitario de Consulta**

Any ADEQ translation or communication in a language other than English is unofficial and not binding on the State of Arizona.

Cualquier traducción o comunicado de ADEQ en un idioma diferente al inglés no es oficial y no sujetará al Estado de Arizona a ninguna obligación jurídica.

Site Name (Nombre del Sitio): \_\_\_\_\_

If you would like to be added to the site mailing list, please fill out the top portion of this form and return it to ADEQ. If you would like to apply to serve on the CAB, please also complete the bottom portion of this form.  
(Si usted quisiera estar en la lista de correo para el sitio, favor de llenar la parte de arriba de este formulario y devolverlo a ADEQ. Si usted quisiera entregar una solicitud para servir en el CAB, favor de también completar la parte abajo de este formulario.)

First Name: \_\_\_\_\_ Last Name: \_\_\_\_\_  
(Nombre) (Apellido)

Organization / Association: \_\_\_\_\_  
(Organización / Asociación)

Address: \_\_\_\_\_  
(Dirección)

City: \_\_\_\_\_ Zip code: \_\_\_\_\_  
(Ciudad) (Código Postal)

Mailing address: (if different from above) Dirección de Correo: (si es diferente de la anterior) \_\_\_\_\_  
City: \_\_\_\_\_  
(Ciudad)

Zip code: \_\_\_\_\_ Email address: \_\_\_\_\_  
(Código Postal) (Correo Electrónico)

Occupation: \_\_\_\_\_ Employer: \_\_\_\_\_  
(Ocupación) (Empleador)

Phone numbers: (home:) \_\_\_\_\_ (work:) \_\_\_\_\_  
(Números de Teléfono): (domicilio) (trabajo:)  
(cell:) \_\_\_\_\_ (other:) \_\_\_\_\_  
(celular) (otro)

**Application for CAB Membership (Solicitud para Membresía en el CAB)**

How long have you lived in or near the Site? \_\_\_\_\_  
(¿Por cuánto tiempo ha vivido usted en o cerca del Sitio?)

Are you willing to make a commitment to serve on the CAB for at least 1 year? \_\_\_\_\_  
(¿Está usted dispuesto(a) a comprometerse a servir en el CAB por lo menos un año?)

Are you able to attend at least four meetings a year? \_\_\_\_\_  
(¿Puede asistir por lo menos a cuatro reuniones por año?)

What day(s) / time(s) would be best for you to attend meetings? \_\_\_\_\_  
(¿Cuáles día(s)/hora(s) serían las mejores para que usted pudiera asistir a las reuniones?)

Please explain why you would like to serve on the CAB (attach a separate sheet if needed):  
(Por favor explique por qué quisiera participar en el CAB) (adjunte otra hoja, si es necesario)

\_\_\_\_\_  
\_\_\_\_\_

Return this application to (Devuelva esta solicitud a):

ADEQ, Outreach Unit, 1110 West Washington, Phoenix, AZ 85007 or fax to (602) 771-4138.

For more information, visit ADEQ's Web site at: [www.azdeq.gov](http://www.azdeq.gov) or contact Delfina Olivarez at (602) 771-4710.

Para más información, favor de visitar la página del Internet de ADEQ al [www.azdeq.gov](http://www.azdeq.gov) ó llame a Juana Bonilla, al (602) 771-4189.

After completion please fold and tape this form before mailing (no staples). Thank you for your interest.  
Después de llenar la solicitud, por favor de doblarla y sellarla (no grapas) antes de enviarla. Gracias por su interés.

FROM:



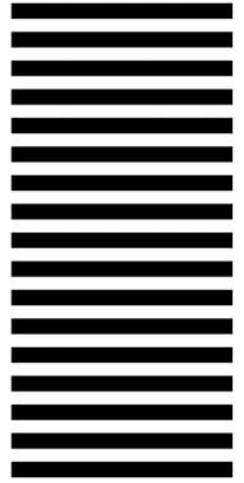
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1110 W. WASHINGTON STREET, 4415B-1  
PHOENIX, AZ 85007-9973



**Community Advisory Board Members Needed!**