Minutes of the Upper Mississippi River Hazardous Spills Coordination Group Meeting (Includes Joint Session with the UMR Water Suppliers Coalition)

October 16-17, 2002

Four Points Sheraton Rock Island, Illinois

John Grump of the Wisconsin Department of Natural Resources called the meeting to order at 1:10 p.m. on October 16, 2002. The following Spills Group members and observers were present:

Jim O'Brien	Illinois Environmental Protection Agency
Dave Perry	Iowa Department of Natural Resources
Stan Kalinoski	Minnesota Pollution Control Agency
John Whitaker	Missouri Department of Natural Resources
John Grump	Wisconsin Department of Natural Resources
Theresa Duvall	U.S. Army Corps of Engineers, Rock Island District
Harvey Dexter	U.S. Coast Guard, Eighth District
Kristi Hynes	U.S. Coast Guard, MSD Quad Cities
Gary Morris	U.S. Coast Guard, MSD Quad Cities
Ann Whelan	U.S. Environmental Protection Agency, Region 5
Janice Kroone	U.S. Environmental Protection Agency, Region 7
Gary Haden	McKinzie Environmental
Barb Naramore	Upper Mississippi River Basin Association
October 16 only	
Anthony Dulka	Illinois Environmental Protection Agency
Wade Boring	Illinois Environmental Protection Agency
Janice Boekhoff	Iowa Department of Natural Resources
Mary Howes	Iowa Department of Natural Resources
Bruce Olsen	Minnesota Department of Health
Brad Palmer	U.S. Army Corps of Engineers, Rock Island District
Rich Gullick	American Water Works Service Company – by phone
Alan Borden	Burlington Waterworks
William Pecord	City of Cape Girardeau
Dave Owens	City of Moline
Sarah Wolff	City of Moline
David Suman	City of Rock Island
Brent Gregory	Illinois-American Water Company
Joel Mohr	Iowa-American Water Company
Judy Starcevich	Iowa-American Water Company
David Schuler	St. Paul Regional Water Services

Minutes of the April Meeting

The minutes of the April 17-18, 2002 UMR Spills Group meeting were approved with three minor editorial changes.

Selection of Spills Group Chair

John Whitaker was selected to serve the next two-year term as chair of the UMR Spills Group. Whitaker's term will commence immediately following this meeting and will conclude following the fall 2004 meeting.

UMR Early Warning Monitoring Network

Current Notification Practices

John Grump noted that Wisconsin does not have any potable water intakes on the UMR and thus does not have any specific procedures for notifying operators about spills to the river. Jim O'Brien explained that Illinois EPA is not the state's official notification agency. However, Illinois EPA staff do make an effort to notify potentially affected water suppliers concerning spills. O'Brien explained that there are no fixed criteria that trigger such notifications. Instead, duty officers use their best professional judgment, and consider the reported size of the spill and other factors. In practice, O'Brien said, Illinois EPA staff generally notify suppliers of all but the very smallest incidents. In response to a question from Joel Mohr, O'Brien said that Illinois does not notify water suppliers in other states. Per the UMR Spills Plan, Illinois notifies other potentially affected states and relies on those states to make further notifications as needed within their own boundaries.

John Whitaker said Missouri's duty officer decides whether to notify the state's drinking water program regarding incidents. In turn, the drinking water program is responsible for notifying individual suppliers as appropriate. Whitaker said both the duty officer and the drinking water program err on the side of caution when deciding whether to make notification. Stan Kalinoski said Minnesota PCA response staff notify intake operators directly, rather than through the duty officer.

Brent Gregory asked the states whether they provide updated information to suppliers as an incident unfolds. Whitaker said Missouri's response staff report information back to the duty officer. Any further dissemination would follow the same chain as the initial notification—i.e., from the duty officer to the drinking water program to the individual suppliers. Grump noted that the magnitude of a spill determines who will receive further information. O'Brien said that Illinois EPA makes an effort to follow-up with suppliers if the agency can provide additional information of value.

Mohr asked for advice regarding how utilities should obtain updated information during an incident. Dave Perry said suppliers should request a call back number when they receive initial notification and then use that number to obtain updates. O'Brien concurred, noting that the state duty officers can provide the incident command (IC) number to affected utility operators. O'Brien cautioned that the IC number may change on a daily basis. He also suggested that utility operators use FEMA's web-based course to familiarize

themselves with the basics of IC. Whitaker also suggested that utilities may want to consider having a representative at the response site who can report back directly. Mohr said Iowa-American has done this on some spills and found it to be helpful.

Brent Gregory asked what constitutes a trigger for state or federal response. O'Brien said response agencies are unlikely to establish an IC if the product is not recoverable. Gregory noted that, depending on the contaminant, an unrecoverable quantity could still be of concern to intake operators.

Mohr credited Iowa DNR with good work in notifying Iowa utilities of both large and small spills. He noted that one time Iowa did not notify the utilities promptly, apparently because the interstate notification protocol was not followed and the state was unaware of the incident for some time. Mohr emphasized the importance of notifying utilities of even small spills because they frequently become the object of considerable media attention. O'Brien noted that responsible parties do not always notify the states directly, despite their legal obligation to do so. In such instances, the state may only learn of the spill via fax from the National Response Center (NRC) on the next business day.

Janice Kroone explained that the NRC notifies the appropriate EPA region(s) of all reports it receives. In Region 7, the OSC reviews the report and decides whether to notify the state directly. Ann Whelan said this is also the practice in Region 5, noting that the region definitely notifies the affected state(s) of all large spills. Kristi Hynes said the policy in the Coast Guard's Quad Cities office is to notify the state(s) of all spills. She attributed this policy to past experience with spills that turned out to be quite a bit larger than initially reported.

Gregory said his personal experience suggests that initial notification to the water suppliers is fairly good. He said the challenge has been obtaining updated information as the incident unfolds. Gregory said suppliers are not clear regarding whom they should contact for updates.

Alan Borden said Iowa DNR has generally done a good job notifying suppliers over the past few years. He cited the Fulton spill as a notable exception, explaining that the only timely notification he received was from another intake operator. Borden said his follow-up attempts to obtain additional information were also unsuccessful. O'Brien noted that the Fulton spill was unusual in that the product was released under the water line and was not visible. The responsible party was not monitoring product volume and significantly underestimated the amount of product released.

Dave Owens suggested that water suppliers establish internal systems to ensure that their staff ask the right questions when they receive a spill notification. For example, Owens said, intake staff should be prompted to request follow-up information. Owens said he recognizes that responders have many priorities during an incident. He explained that suppliers do not want to interfere, but do want the information needed to protect their customers and operations. Mohr said the UMR Water Suppliers Coalition is working on a notification system within the coalition that will enable suppliers to share information with one another during an incident.

Rich Gullick reported that intake operators and others on the Susquehanna River are exploring the potential for a secure, web-based system for exchanging spill-related information. He noted that such a system would be quite efficient for responders, who could simply post updated information periodically rather than attempting answering intake operators' individual requests for updates.

Gregory said his experience with ORSANCO's spill notification procedures has been very good. ORSANCO receives notifications and then, in turn, notifies intake operators. After initial notification, ORSANCO tracks the incident and provides updates to the suppliers. Gullick agreed that this has proven to be a good system, but noted that there are no immediate prospects for developing something similar on the Upper Mississippi. He stressed the importance of examining other options, including phone trees and web-based systems.

Janice Kroone suggested that any notification system established for UMR water suppliers should also include nuclear power plants and state health departments. Gregory noted that the UMR Suppliers Coalition is focused on the needs of community water suppliers. However, he agreed that the group should consider adding other key entities to any communications system that it develops. O'Brien noted that industrial and power plant intake operators expressed little interest when they were surveyed about a potential UMR early warning monitoring network (EWMN).

Update from EWMN Scoping Group

Barb Naramore reported that the UMRBA has established a Scoping Group to explore the potential for a UMR EWMN. The group of approximately 20 includes representatives of drinking water intakes as well as state and federal response and drinking water programs. Naramore explained that the group will be asked to consider a range of practical questions related to early warning monitoring on the UMR. If such an EWMN appears viable, the Scoping Group will be asked to design a pilot station to test and refine the strategy. The Scoping Group held its first conference call on August 21 and has its next call set for October 18.

Ann Whelan explained that EPA Region 5 has provided some initial funds to facilitate the scoping effort and to fund the pilot station, if a decision is made to proceed. She noted that actually establishing a network would require both a front-end capital investment to equip the stations as well as funding for on-going operating expenses. Whelan said the Scoping Group is deferring further consideration of future funding needs until the scoping effort is completed.

Brent Gregory said the Scoping Group has preliminarily identified the following parameters of primary interest: oil and petrochemicals, bacteria, atrazine, ammonia, nitrate, algae, oxidant demand, and basic physical parameters that can serve as indicators. He noted that the list of parameters is subject to revision as the group explores equipment options and other issues. Staff at TetraTech, an EPA Region 5 contractor, will be inventorying available equipment on behalf of the group. The group agreed to defer biomonitoring at this time, given that the protocols and technologies are not wellestablished. Gregory explained that operational challenges include determining the appropriate spatial distribution of stations and integrating existing data collection efforts into any new EWMN. Regarding monitoring frequency, Gregory explained that most of the parameters of interest would need to be monitored on a continuous, or at least daily, basis in order to afford adequate response time. He said the group plans to examine available risk assessment tools and will evaluate spatial relationships among intakes and potential sources.

Regarding the spatial distribution of monitoring sites, Whelan noted that factors include the location of monitoring sites relative to intake locations and other points of vulnerability, the distribution of potential sources, and the availability of suitable monitoring sites. Jim O'Brien also stressed the need for secure sites where the monitoring equipment will not be vulnerable to tampering.

Whelan emphasized that notification and information dissemination will be essential parts of any viable EWMN. She acknowledged the potential usefulness of automated systems, but said human and institutional components will also be key.

Water Utility and Response Agency Perspectives

Gregory said members of the Suppliers Coalition were asked in a recent survey about their potential roles in, and contributions to, a UMR EWMN. Gullick said he had received some responses, but had not yet heard back from all members. So far, the suppliers have all expressed a willingness to share data and an interest in additional monitoring. Most have also expressed potential willingness to host a pilot station, but have indicated that they would not be able to contribute funding toward a monitoring station. Gullick noted that the current economic climate makes this a very difficult time to ask suppliers to contribute staff resources or funding.

John Grump asked what the utilities contribute to the network on the Ohio River. Gullick said the Ohio River water users primarily make in-kind contributions to the system, mostly in the form of staff time. ORSANCO purchases the monitoring equipment. He stressed that other cost-sharing approaches have been used elsewhere on cooperative projects involving suppliers and public agencies and could be considered on the UMR. He noted that securing commitments is particularly difficult at the outset of a project and said EPA Region 5's contribution to the scoping and pilot effort is especially helpful in this regard.

Mohr said utilities would be interested in pre-staged response equipment that could be used to protect intakes. O'Brien cautioned that response equipment is expensive to buy and maintain. In addition, considerable training is required to ensure personnel are qualified to deploy the equipment safely and effectively. O'Brien said it would be difficult to justify an extensive system of pre-staged equipment on the UMR, given the spills history on the river. Grump and Naramore noted that industry cooperatives in some urbanized areas have pooled resources to purchase equipment.

Whelan said EPA reviewed available equipment on the UMR a few years ago and found that the quantities, while limited, did meet federal regulations. She also noted that, in the event of a spill, a utility could contract directly for the protection of its intake and subsequently seek reimbursement through the Oil Spill Liability Trust Fund (OSLTF).

Janice Kroone cautioned that boom will not necessarily protect an intake. Kristi Hynes concurred, noting that boom could even exacerbate conditions by entraining the product. John Whitaker added that fast water significantly limits what can be accomplished with boom. Stan Kalinoski cited debris and ice as other factors that can limit booming options on the UMR. Whelan noted that the Spills Group and others have been exploring boom vane, boom deflectors, barges, and the vessel of opportunity skimming system (VOSS) as possible substitutes for, or enhancement to, traditional boom.

While agreeing that boom has limitations, Harvey Dexter emphasized that boom can often be very effective for containment, diversion, and deflection on rivers. Dexter explained that both the Coast Guard and EPA have access to a range of response resources and urged water suppliers to work with the two agencies to ensure that their needs are met in the event of a spill. Whelan agreed, but noted that the federal agencies are often not on scene at smaller spills. In such instances, Whelan suggested that utilities consider hiring a contractor directly if needed to protect their intake, and then seek reimbursement subsequently from the OSLTF.

The meeting adjourned for a tour of the Moline water treatment plant at 3:30 p.m. The meeting reconvened at 8:00 a.m. on October 17.

Coast Guard's Reordered Mission Priorities

Harvey Dexter described the expansion of several security-related Coast Guard missions, including increasing security patrols, escorting navy vessels, boarding high interest vessels, establishing Port Security Committees for commercial ports, establishing Port Readiness Committees for military ports, and facilitating preparation of the security grant proposals that commercial ports are submitting to the Transportation Security Administration.

Within the Eighth District, Dexter and Kristi Hynes said the tempo of security patrols has increased substantially relative to pre-9/11 practices. Dexter said the Coast Guard reservists have been key to this heightened operations pace. However, Dexter said reliance on the reservists is now being reduced somewhat. He emphasized that this does not represent a reduced commitment to security missions. Dexter briefly described several challenges associated with the increased operations tempo, including the time required to requalify active duty and reserve personnel on weapons; the expanded maintenance associated with increased demands on vessels, aircraft, and other assets; the adequacy of personnel levels to support 24x7 staffing, particularly at smaller stations; and the Coast Guard's practice of rotating uniformed personnel approximately every three years.

Dexter said selected low consequence missions have already been reduced, including some examinations and safety boardings. Additional workload reduction measures are under consideration, including potential reductions in various marine safety-related efforts, abandoned vessel removal actions, contingency planning, voluntary drydock examinations, and response to small spills. Dexter emphasized that final decisions have not been made on these potential workload reduction measures. Critical factors that will influence the decisions include the Coast Guard's move to the Department of Homeland Security; demands associated with any additional terrorist incidents, spills of national significance, or

other major marine casualties; other operational demands; and the Coast Guard's staffing situation.

In response to a question from Barb Naramore, Dexter said he did not know what type of consultation process the Coast Guard might use as it considers the workload reduction options. Dexter said he anticipates that various groups and forums will be consulted. He noted that some possible actions would require Congressional approval, while others could be accomplished administratively. Naramore asked Dexter to ensure that the Coast Guard consults with UMR Spills Group as appropriate.

Iowa's Response Strategy Effort

Dave Perry explained that Iowa DNR is examining how it can enhance its UMR response capabilities. He said this effort has come partly in response to the Coast Guard's changed mission priorities. Specifically, the DNR is attempting to extend the Quad Cities response strategies approach to the remainder of the UMR in Iowa. Largely as a one-person effort, Perry is attempting to identify access points and potential locations for containment, deflection, etc. Perry is logging coordinates for key locations, taking digital photos, and confirming the names and addresses of adjacent facilities. Perry said he is still in data collection mode, having completed 4 of 10 counties. He will wait to decide on a format until the Quad Cities Sub-Area Committee finalizes a format for its response strategies. Perry said he will likely combine the Quad Cities format with the Tri-State Committee's communications information.

In response to a question from Gary Haden, Perry said Iowa DNR has not decided whether to extend this approach to its portion of the Missouri River. John Whitak er asked Perry whether he was creating a GIS database. Perry said this decision had not yet been made. Also in response to Whitaker, Perry said he has been assessing sites strictly from the land side. He said he will consult with the department's fish and wildlife people before finalizing his information. Barb Naramore encouraged Perry to seek input from the Fish and Wildlife Service as well. Ann Whelan said EPA Region 5 would consider integrating the information into the sensitivity maps.

UMR Spill Plan

Barb Naramore briefly reviewed the draft Corps of Engineers coordination protocol, explaining that she drafted the language based on letters received from the three Corps districts. The protocol outlines the types of assistance that the Corps may be able to provide to responders, as well as the limitations on that assistance. It also describes the process for requesting assistance and provides appropriate contact information.

Theresa Duvall said she had no comments on the draft protocol, and was not aware of any from others within the Corps. John Whitaker asked how long it might be possible to close a dam in the event of a spill. Duvall said this would be highly variable, depending on the season, flow, and specific lock and dam structure in question. Ann Whelan noted that there are many ways in which the Corps could facilitate a response short of closing the gates at a dam.

Naramore asked Spills Group members for any other updates to the UMR Plan. Whitaker provided a phone number change for Missouri DNR. Dave Perry said he has asked student workers to review the plan and confirm phone numbers for various facilities in Iowa. Perry said he would provide updates to Naramore as soon as possible.

John Grump asked Spills Group members to confirm distribution of the previous plan updates issued in 2001, reporting that he had provided those updates to Wisconsin's plan holders. Perry said all Iowa DNR field offices, as well as all local hazmat teams that respond on the river, have current copies of the plan. Jim O'Brien said all 18 plan holders in Illinois have the current plan. This includes 17 people within Illinois EPA and one in the Illinois Emergency Management Agency. Whelan said she would confirm with Steve Faryan that the 2001 updates were distributed to Region 5's plan holders, which include all duty officers and all Chicago-based OSCs.

Stan Kalinoski said he was not familiar with previous distribution practices within Minnesota, but said he would look into the situation. Janice Kroone said she was not aware of how the UMR Plan has been distributed and maintained within Region 7. However, she said she would make sure that the UMR Plan and all sub-area plans are on the region's response vehicles. Whelan concurred that the UMR Plan should be on all EPA response vehicles. She said it would be helpful to have the UMR Plan and sensitivity maps on a special CD-ROM for this purpose.

Harvey Dexter said he was not certain whether all Coast Guard offices on the river have the current plan. Dexter said he would follow up with LT Dave Pertuz on this matter. Duvall said she did not receive the 2001 updates from Susan Hampton. Duvall said she suspects this is the case with personnel in the other two Corps districts as well and offered to follow-up with Hampton's assistant.

Whitaker reported that he distributed the 2001 updates to plan holders within Missouri DNR. He noted that Missouri does not distribute the plan to local officials and asked whether other states do so. O'Brien said Illinois does not distribute the UMR Plan beyond the state level. Grump said Wisconsin distributes the plan to Level A hazmat teams and two of Wisconsin Emergency Management's district coordinators. Perry said he provides the plan to hazmat teams on the river and to the Scott County Emergency Management Agency. Whitaker said he was thinking of distributing the plan to county emergency managers on the river.

Kroone asked about distribution to state law enforcement officers who patrol the UMR. Grump said all Wisconsin wardens on the river have and use the plan. Perry and Whitaker said their states' officers do not get involved in spill response and do not currently have the plan.

Report from the Tri-State Hazmat Group

John Grump and Dave Perry reported that the Tri-State Hazmat Group's August exercise tested radio, cellular, satellite phone, and pager communications along the UMR. The radio options explored included ham radios. NOAA weather radio reception was also tested. Perry noted that the effectiveness of the various communications tools varied

depending on a range of factors. Grump said participants had difficulty contacting Fish and Wildlife Service personnel.

Paducah VOSS Deployment

Harvey Dexter reported that the Coast Guard conducted a VOSS deployment exercise at Paducah, Kentucky in August 2002. The deployment took place between river miles 935-936 on the Ohio River, which is in the downtown area at the confluence with the Tennessee River. The exercise was held at an Ingram Barge facility. Participants included several Coast Guard units and various observers, including the U.S. EPA, Kentucky Department of Water Quality, and Illinois EPA.

According to Dexter, objectives included training personnel on the VOSS, deploying the VOSS from a 65-foot Coast Guard vessel in a river environment, evaluating oil spill flow diverter equipment in conjunction with the VOSS, and practicing fast-water booming and skimming. Conditions during the deployment were sunny and mild, with a light wind and a 0.5 knot current. Dexter said the flow was too slow to test the VOSS's fast water capabilities.

Ingram's on site crane was too small to transfer the VOSS from the tractor trailer to the vessel. A higher capacity crane nearby was used. Dexter said adequate crane capacity is a key requirement for those contemplating using the VOSS in an actual response.

Among the deployment's successes, Dexter highlighted planning, safety, and training; integrating Coast Guard crews that had not previously worked together; working cooperatively with industry; effective skimming in a river environment under low flow conditions; and ability to maintain maneuverability of the deployment vessels and thus keep the river open to traffic. Experience with the oil spill flow diverter, which was towed behind a Coast Guard cutter, was inconclusive. The cutter was underpowered for two diverters. When one of the diverters was removed, the remaining one performed better.

Lessons learned include the importance of ensuring that the vessel crew has the necessary HAZWOPER training. Dexter noted that this would be a particular issue in the event of an actual incident in which responders wanted to use a civilian vessel. Other lessons include: 1) equipment set up took considerably longer than anticipated, 2) the flow diverter worked best approximately 200 yards in front of the skimmer; 3) the helmsman could not see the apex of the boom when underway; and 4) the maneuverability of the flow diverter could be improved with longer foil hulls.

Dexter said the Coast Guard plans additional VOSS deployments using its own as well as industry vessels. Plans also include additional experimentation with the oil spill flow diverter, boom vane, and other alternative technologies; enhanced advanced training; and participation in other Coast Guard Districts' fast water exercises. In response to a question from Kroone, Dexter said the Coast Guard wants to deploy the VOSS annually on the western rivers to maintain staff training as personnel are rotated. Kroone and Jim O'Brien stressed the importance of clearly identifying VOSS requirements, such as crane or fork lift capacity, in advance. This is essential if responders are to accurately assess the VOSS's potential in the context of a specific incident.

Planning and Mapping Updates

With the Greater St. Louis Sub-Area Contingency Plan completed, John Whitaker reported that the next step for the Sub-Area Committee is to exercise the plan. The committee has a conference call scheduled for next week to discuss the possibility of participating in an exercise being planned by Koch Pipeline for the Wood River area. Barb Naramore reported that she received a call within the last week from Mark McMahon of Koch, indicating that Koch has postponed the exercise previously planned for this fall. Instead, Koch plans to hold a full-scale exercise, including a communications component, sometime during 2003.

Dave Perry said he and other members of the Quad Cities Sub-Area Committee observed a recent boom deployment by Phillips Petroleum. The exercise also included a notification component. Perry highlighted lessons learned, including the omission of Iowa DNR from Phillips' notification list, the need for larger boats in challenging river conditions, and the need to obtain prior approval if the company plans to release rice hulls or other material to simulate spilled product.

Gary Haden circulated a mock-up of the response strategies document for the Quad Cities. He noted that Jim O'Brien had suggested integrating photos with the text describing the strategies. Haden said this approach does not appear to be feasible.

Barb Naramore reported that MPCA and the Wakota CAER group held an August drill to test several of the response strategies developed for the Twin Cities. The drill focused on the Upper Mississippi below St. Paul and above Hastings, Minnesota. UMRBA staff is incorporating feedback from drill participants into revised descriptions of the strategies. Naramore noted that the CAER drill was successful, and definitely appears to be a more effective way to test strategies than the alternative of relying on individual facilities to evaluate the strategies as part of internal drills. She also reported that the members of Wakota CAER have recently combined resources to purchase response equipment that has been pre-staged at several locations along the river between St. Paul and Hastings.

Ann Whelan announced that EPA Region 5 will be stationing an OSC in the Twin Cities on a permanent basis. Sonia Vega will be filling this position. Her response area will include portions of Minnesota and Wisconsin.

Whelan also reported that inland sensitivity maps will be completed for all of Region 5 by the end of federal FY 03. The Twin Cities atlas will be updated and expanded to include several counties along the St. Croix River. Pending issues include determining a schedule and strategy for updating the sensitivity atlases. EPA Region 5 managers have committed to updating the maps on a three-year cycle. Whelan said updating will be done on a state-by-state basis, with Illinois likely to be the first UMR state updated in Region 5. Region 5 will also work with the UMRBA and Great Lakes Commission to add a hazardous materials data layer to the maps. These facilities will be drawn primarily from the extremely hazardous substances database, with the addition of nuclear power plants and facilities that handle certain pesticides and flammable materials. The hazmat data will likely be included only in the digital map products due to data density issues. Whelan said

the addition of hazmat information for the portions of Iowa and Missouri that are covered in the inland sensitivity maps would be contingent upon Region 7 providing the necessary data.

Naramore explained that, where available, response strategies will be incorporated into the inland sensitivity maps as the maps are updated. To-date in the Twin Cities and Quad Cities, response strategies have been developed as free-standing documents, with somewhat variable formats. In order to incorporate the strategies into the maps, a consistent approach will need to be devised. Naramore briefly reviewed the format currently used in the Twin Cities, which includes text descriptions of the strategy, linked via reference numbers to a set of separate response strategies maps. The text descriptions include information on the area in question, land and water access, the strategy itself, possible constraints on executing the strategy, and sensitive resources likely to be found in the area. Naramore said that this same basic map and text approach could be used in the sensitivity atlases, with icons indicating strategy locations displayed along with all of the current data identifying potential sources, sensitive resources, etc. She circulated samples of a potential table entry and text description, as well as icon options.

John Grump said he would like to be able to click on the response strategy icon and pull up the corresponding strategy text. Whelan suggested avoiding categorizing strategies as "other" when possible. She also emphasized the need for a standard set of strategy categories that will be employed wherever response strategies are developed. Whelan said her long-term goal is to move away from reliance on the PDF maps to a user-friendly interface that permits non-GIS experts to use the ArcView files effectively. Development of such an interface would support functions to enhance access to detailed information concerning the response strategies and other data layers.

Agency Updates

Dave Perry said that a total of 66 incidents were reported since May 1, 2002 in the 10 Iowa counties bordering the UMR. These incidents did not all involve spills to state waters. Twenty-two of the reported spills were in Scott County. Perry said there was a notification problem with one incident, where the state duty officer failed to notify officials in Scott County.

Jim O'Brien said there have not been any significant recent UMR-related spills in Illinois. O'Brien said the state has been devoting considerable effort to augmenting its counterterrorism capabilities. He described a variety of equipment that the state has acquired as part of this effort, including remotely operated chemical monitoring platforms, radiation and chemical detection equipment, particulate monitors, water test kits, and test kits for biological hazards. O'Brien also provided an update on the state's three integrated response teams established after 9/11. These interdisciplinary teams include members with expertise in law enforcement; counter-terrorism; and chemical, biological, and radiological hazards. Recent efforts have focused on cross-training among the members. The state is also devoting resources to equipping hazmat teams throughout Illinois.

Stan Kalinoski said there were many reports of illegal pumping on the UMR last summer. State, city, and Coast Guard personnel all investigated the reports, but no citations were ultimately issued. Kalinoski also reported that Minnesota approved an *in-situ* burn near Grand Rapids to address a spill over the July 4 holiday.

John Whitaker reported that there have not been any significant spills affecting the UMR in Missouri recently. Whitaker said an investigation continues into a chlorine leak at a facility in Jefferson County. The leak occurred when a hose ruptured during transfer from rail cars to smaller containers used by utilities. Approximately 48,000 pounds were lost. Whitaker also noted that there have been problems in the St. Louis area with failure to report releases and with fire fighters hosing oil into storm sewers. Whitaker and other Missouri DNR staff are working to address both issues.

John Grump said an angler reported an oil slick in Pool 9. The release of approximately 65 gallons was traced to a towboat, and the boat's crew acknowledged responsibility to Coast Guard personnel. Grump also reported that a tow ran into Lock and Dam 3, resulting in a fuel release. The fuel was contained in the lock structure and recovered.

Ann Whelan described an incident on the River Rouge in Detroit. Mixed, used oil emerged from a sewer outfall and was first reported on April 10, 2002. Initially the release was estimated at 5,000 gallons, but the volume ultimately proved to be considerably greater, perhaps as much as 250,000 gallons. Some oil reached Lake Erie via the Detroit River. The release continued over several weeks. Investigators are still trying to determine the source, but have not been able to fingerprint the material because of its composite nature.

Other Business

The UMR Spills Group's next meeting was scheduled for April 16-17, 2003 in the Quad Cities. [Note: the meeting dates were subsequently shifted to April 15-16, 2003.]

With no further business, the meeting adjourned at 12:34 p.m.