

**PRESENTATION**

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*The presenter for this topic (**The Rapid Engineering Program**) was also the synopsis preparer. Because the subject matter and approach for synopsis and presentation were essentially identical, we report below only that material uniquely introduced in the presentation. That material has been reviewed by the presenter for accuracy. The reader is otherwise referred to the synopsis for a summary of the topic and germane issues.*

Dr. Gailey presented a matrix showing the emphasis of each project by type of assessment (source, environment, or PE) and focus (protocol development, measurements, or data analysis). Boldface is used to indicate the principal emphasis of the study. See key below for project references.

**Table 1-1: Focus of Project by Type of Assessment**

	<b>Protocol Development</b>	<b>Measurements</b>	<b>Data Analysis</b>
<b>Studies of Field Sources</b>	<b>RAPID #1</b> U.S. Department of Transportation	<b>University of Southern California</b> U.S. Department of Transportation University of Bristol RAPID #1 RAPID #2 RAPID #3	<b>RAPID #5</b> <b>RAPID #8</b> University of Bristol
<b>Studies of Field Environments</b>	<b>RAPID #2</b> National Institute for Occupational Safety and Health	<b>RAPID #3</b> RAPID #2 National Institute for Occupational Safety and Health	<b>RAPID #5</b>
<b>Personal Exposure Assessment</b>	<b>RAPID #4</b> RAPID#6	<b>University of Washington</b> University of Bristol RAPID #4 RAPID #6 RAPID #7	<b>University of Bristol</b> <b>RAPID #5</b> <b>RAPID #6</b> <b>RAPID #7</b>

**Subcontractor/Title of Project**

**University of Bristol:** Kaune, W.T., Preece, A.W., Grainger, P., Golding, J. Assessment of Human Exposure to Magnetic Fields Produced by Domestic Appliances. University of Bristol for Lockheed Martin Energy Systems, Inc., Oak Ridge, Tennessee. 1996.

**University of Southern California:** Sobel, E., and Z. Davanipour. Preliminary Investigation into EMF Exposures Resulting from the Use of Home Sewing Machines. University of Southern California, for Oak Ridge National Laboratory. 1996.

**University of Washington:** Yost, M., and P. Hogue. Characterization of Exposures to ELF Magnetic fields in the Office Environment. University of Washington for Oak Ridge National Laboratories. 1995.

**National Institute for Occupational Safety and Health:** Methner, M., and J.D. Bowman. Hazard Surveillance for Workplace Magnetic Fields: I. Walkaround Sampling Method for Measuring Ambient Field Magnitude. II. Field Characteristics from Waveform Measurements. Report to the U.S. Department of Energy. Prepared for National Institute for Occupational Safety and Health. 1998.

**U.S. Department of Transportation:** Final report is in preparation. Preliminary information is available in: Electric Research and Management, Inc. Survey and Assessment of Electric and Magnetic Field (EMF) Public Exposure in the Transportation Environment. Prepared for U.S. Department of Transportation, Cambridge, MA. 1997.

**RAPID #1:** Electric Research and Management, Inc. Development of Recommendations for Guidelines for Field Source Measurement. For Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1997.

**RAPID #2:** Bittner, P. Recommendations for Guidelines for Environment-specific Magnetic-field Measurement. Magnetic Measurements, for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1997.

**RAPID #3:** Zaffanella, L.E. Environmental Field Surveys. Eneritech Consultants, for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1996.

**RAPID #4:** Bracken, T.D., Rankin, R.F., Wiley, J.F., Bittner, P. Recommendations for Guidelines for Personal Exposure Field Measurements. T. Dan Bracken, Inc., for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1997.

**RAPID #5:** T. Dan Bracken, Inc. Development of an EMF Measurement Database. Interim Reports. T. Dan Bracken, Inc. for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1997, 1998.

**RAPID #6:** Zaffanella, L.E., and G.W. Kalton. Survey of Personal Magnetic Field Exposure: Phase I: Pilot Study and Design of Phase II. RAPID Engineering Project #6. Enertech, for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1998a. Zaffanella, L.E., and G.W. Kalton. Survey of Personal Magnetic Field Exposure: Phase II: 1000-Person Survey. Interim Report. RAPID Engineering Project #6. Enertech, for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1998b.

**RAPID #7:** Final report is in preparation. Preliminary information is available in: Rankin, R.F.; and T.D. Bracken Development of a Magnetic Field Exposure Model. *In:* W/L Associates Ltd. (Ed.) (1997): Project abstracts: The annual review of research on biological effects of electric and magnetic fields from the generation, delivery, & use of electricity, San Diego, California, USA. November 9-1, 1997. W/L Associates Ltd., Frederick, MD. 1997.

**RAPID #8:** Johnson, T.R., and J.R. Gauger. Evaluation of Field Reduction Technologies. IIT Research Institute, for Oak Ridge National Laboratory EMF Research Program. U.S. Department of Energy. 1997.