| | RDT&E BUDGET ITEM | JUSTI | FICATI | ON SH | EET (R | -2 Exhi | bit) | | DATE | Februar | y 2003 | |
|------|------------------------------|-------------------|---------------------|---------------------|---------------------|---|---------------------|---------------------|---------------------|---------------------|------------|--|
| | | | | | | PE NUMBER AND TITLE 0603850F Integrated Broadcast Service (DEM/VAL) | | | | | | |
| | COST (\$ in Thousands) | FY 2002 Actual | FY 2003 Estimate | FY 2004 Estimate | FY 2005 Estimate | FY 2006 Estimate | FY 2007 Estimate | FY 2008 Estimate | FY 2009 Estimate | Cost to Complete | Total Cost | |
| 4778 | Integrated Broadcast Service | 16,639 | 38,390 | 16,466 | 23,990 | 20,210 | 20,857 | 21,286 | 21,572 | Continuing | TBD | |
| | Quantity of RDT&E Articles | 0 | 1 | 1 | 2 | 0 | 0 | 0 | 0 | Continuing | TBD | |

A. Mission Description

The Integrated Broadcast Service (IBS) provides war fighters with critical and highly perishable intelligence in a single, correlated picture via a near-real-time, integrated dissemination architecture. IBS consolidates existing intelligence broadcast systems into a common-format and theater-tailored architecture. The IBS design incorporates new functionality in broadcast and information management and a new message format. It fields Information Management Elements (IME) to geographic Combatant Commanders; built to requirements as set forth in the Joint Operational Requirements Document. Functional characteristics include:

- Accept data from dissimilar, geographically-dispersed, multi-INT sources.
- Transmit to end users equipped with Joint Tactical Terminal (JTT) or terminals which incorporate the Common IBS Modules (CIBS-M).
- Disseminate intelligence focused on user generated and combatant commander validated priorities.
- Disseminate intelligence over communications paths available to the end user.

| (U) FY 2002 (S | in Thousands) |
|----------------|---------------|
|----------------|---------------|

| (0) | 1 1 2002 (\$ III 1 III Ousa | mus) |
|-----|-----------------------------|--|
| (U) | \$0 | Accomplishments/Planned Program |
| (U) | \$3,013 | Maintained a Program Management Office, including program supervision, finance and acquisition strategy execution |
| (U) | \$1,908 | Continued systems engineering, including maintenance of architectures, System of Systems management through the Joint Broadcast Change |
| | | Control Board (JBCCB) and Risk Reduction Studies using Simulation Based Acquisition (SBA) tools. |
| (U) | \$9,378 | Continued the design and build of Information Management Elements (Phase II) |
| (U) | \$2,242 | Continued Common Message Format (CMF) development. |
| (U) | \$98 | Test & Evaluation |

(U) \$16,639 Total

Exhibit R-2 (PE 0603850F Project 4778 Page 1 of 6 Pages

| | RDT&E BUDGET ITEM JUSTIFICATION SHEET (R-2 Exhibit) | | | | | | | | | | | |
|------|--|---|---|----------------------------------|--|--|--|--|--|--|--|--|
| 04 - | GET ACTIVITY Advanced D&P) | I Component Development and Prototypes | PE NUMBER AND TITLE 0603850F Integrated Broadcast Servi | PROJECT 4778 | | | | | | | | |
| (U) | A. Mission D | Description Continued | | | | | | | | | | |
| (U) | FY 2003 (\$ ir | n Thousands) | | | | | | | | | | |
| (U) | \$0 Accomplishments/Planned Program | | | | | | | | | | | |
| (U) | \$800 | Maintain a Program Management Office, including pr | Maintain a Program Management Office, including program supervision, finance and acquisition strategy execution. | | | | | | | | | |
| (U) | \$1,960 Continue systems engineering, including development of architectures, System of Systems management through the JBCCB and Risk Reduction Studies using SBA tools. | | | | | | | | | | | |
| (U) | \$14,884 | · | | | | | | | | | | |
| (U) | \$946 | Continue Common Message Format (CMF) developm | Continue Common Message Format (CMF) development | | | | | | | | | |
| (U) | \$600 | Continue Test & Evaluation | | | | | | | | | | |
| (U) | \$19,200 | Continue spiral development efforts on IBS Information | Continue spiral development efforts on IBS Informational Element (IME) through 'Smart Pull' Capability and increased/improved dissemination | | | | | | | | | |
| | | processes. | | | | | | | | | | |
| (U) | \$38,390 | Total | | | | | | | | | | |
| (U) | FY 2004 (\$ in | n Thousands) | | | | | | | | | | |
| (U) | \$0 | Accomplishments/Planned Program | | | | | | | | | | |
| (U) | \$800 | Maintain a Program Management Office, including pr | ogram supervision, finance and acquisition strategy ex | ecution | | | | | | | | |
| (U) | \$1,400 | Continue systems engineering, including development Studies using SBA tools. | t of architectures, System of Systems management thro | ugh the JBCCB and Risk Reduction | | | | | | | | |
| (U) | \$10,985 | Continue the design and build of Information Manage | ment Elements (Phase II) | | | | | | | | | |
| (U) | \$2,681 | Continue Common Message Format (CMF) developm | nent. | | | | | | | | | |
| (U) | \$600 | Continue Test & Evaluation. | | | | | | | | | | |
| (U) | \$16,466 | Total | | | | | | | | | | |
| (U) | | etivity Justification is in budget activity 4 because it includes demonstrating and values. | alidating the use of technologies to create an operationa | al integrated broadcast service. | | | | | | | | |

| | RDT&E BU | JDGET IT | TEM JUS | STIFICA | TION | SHEET (| R-2 Exh | ibit) | | DATE February | 2003 |
|--------------|---|----------------------------------|---|--|--------------------------------|--------------------------------------|-----------------------------|-----------------------------|---|-----------------------------------|---------------------------------|
| 04 - | SET ACTIVITY Advanced Compone D&P) | nt Develop | oment and | d Prototy | pes | PE NUMBER 0603850 1 | | ted Broadcas | st Servi | ce (DEM/VAL) | PROJECT 4778 |
| (U) | C. Program Change Summ | ary (\$ in Tho | usands) | | | | | | | | |
| (U) (U) | Previous President's Budget Appropriated Value | | | | | | FY 2002 17,149 20,529 | FY 2003 19,870 19,870 | <u>F</u> | <u>Y 2004</u> 9,734 | <u>Total Cost</u> TBD TBD |
| (U) | Adjustments to Appropriated a. Congressional/General Re- b. Small Business Innovative | ductions Research | | | | | -3,461 | -72 | | | |
| | c. Omnibus or Other Above ofd. Below Threshold Reprograe. Rescissions | am | | | | | -429 | -196 -412 | | | |
| (U) (U) | Adjustments to Budget Years Current Budget Submit/FY 2 | | O3 PBR | | | | 16,639 | 19,200 38,390 | | 6,732 16,466 | TBD |
| (U) | Significant Program Changes (N/A) | <u>s:</u> | | | | | | | | | |
| (U) | D. Other Program Funding | • | | | | | | | | _ | |
| (U) (U) | OPAF/PE0305179F O&M/PE0305179F | FY 2002 Actual 0 31,749 | FY 2003 Estimate 13,488 17,090 | FY 2004 Estimate 7,232 16,437 | FY 20 Estim 10,8 16,5 | <u>ate</u> <u>Estima</u> 17 11,11 | te <u>Estimat</u> 0 11,72 | <u>Estimate</u> 8 11,980 | FY 2009 Estimate 12,178 18,422 | <u>Cost to</u> <u>Complete</u> | <u>Total Cos</u> TBD TBD |
| (U) | E. Acquisition Strategy IBS used a Program Definitio Phase II contract was based or | | | | • | | _ | <u> </u> | | opment (EMD) phas | e. Award of the |
| (U) | F. Schedule Profile | | | | | FY 2002 | | FY 20 | 03 | FY 2 | 2004 |
| P | roject 4778 | | | | Page | e 3 of 6 Pages | | | | Exhibit R-2 (Pl | E 0603850F) |

| RDT&E BUDGET ITEM JUSTIFICATION SHEET (R-2 Exhibit) | | | | | | | | | DATE February 2003 | | | |
|--|---|-----|---|-----------------|--------------|---|-------------|---------------------|--------------------|-------|--|--|
| BUDGET ACTIVITY 04 - Advanced Component Development and Prototypes (ACD&P) | PE NUMBER AND TITLE 0603850F Integrated Broadcast Se | | | st Ser | • | | | PROJECT 4778 | | | | |
| (U) Spiral I PDR (U) Spiral I Integration Test (U) Spiral I Capability Demonstration (U) Common Message Format (U) - Interim Development Complete (U) Spiral II PDR (U) Spiral II Final Design Review (U) Spiral II Integration Test (U) Spiral II SIOC (Single Initial Operational Capability) (U) Spiral III PDR (U) Spiral III Final Design Review * - Denotes completed event X - Denotes planned event | FY 2002 2 3 * | * * | 1 | <u>FY 200</u> 2 |) <u>3</u> 3 | 4 | X X X | FY 2 2 | 3 | 4 | | |
| Project 4778 Pa | age 4 of 6 Pages | | | | | | Exhibit | R-2 (PE | 06038 | 350F) | | |

| RDT&E PRO | GRAM ELE | EMENT/P | ROJECT C | OST B | REAKDO | WN (R-3) |) | DATE F | ebruary 2 | 2003 |
|--|------------------|-------------------|-------------------|----------------|----------------------------|---------------|---------------|---------------|---------------|---------------------|
| BUDGET ACTIVITY 04 - Advanced Compone (ACD&P) | ent Develop | ment and | Prototypes | - | BER AND TITLE 50F Integra | ated Broa | dcast Ser | vice (DEN | //VAL) | PROJECT 4778 |
| (U) A. Project Cost Breakdow | n (\$ in Thousan | ıds) | | | | | | | | |
| | | | | | | FY 2 | <u> 2002</u> | FY 20 | <u>003</u> | FY 2004 |
| (U) Program Management | | | | | | 3. | ,013 | 80 | 00 | 800 |
| (U) System Engineering | | | | | | 1, | ,908 | 1,90 | 60 | 1,400 |
| (U) Information Management E | lement (Phase I | & Phase II) | | | | 9. | ,378 | 34,0 | 84 | 10,985 |
| (U) Common Message Format l | Development | | | | | 2. | ,242 | 94 | 46 | 2,681 |
| (U) Test & Evaluation | | | | | | | 98 | 60 | 00 | 600 |
| (U) Total | | | | | | 16. | ,639 | 38,39 | 90 | 16,466 |
| (U) B. Budget Acquisition Hist | tory and Planni | ng Informatio | n (\$ in Thousand | <u>s</u>) | | | | | | |
| (U) Performing Organizations | <u>:</u> | | | | | | | | | |
| Contractor or | Contract | | | | | | | | | |
| <u>Government</u> | Method/Type | Award or | Performing | Project | | | | | | |
| <u>Performing</u> | or Funding | Obligation | <u>Activity</u> | Office Office | Total Prior | Budget | Budget | <u>Budget</u> | Budget to | <u>Total</u> |
| <u>Activity</u> | <u>Vehicle</u> | <u>Date</u> | <u>EAC</u> | <u>EAC</u> | to FY 2002 | FY 2002 | FY 2003 | FY 2004 | Complete | <u>Program</u> |
| Product Development Organ | <u>nizations</u> | | | | | | | | | |
| Lockheed Martin (Phase I) | FFP | June 00 | 2,000 | 2,000 | 2,000 | 0 | 0 | 0 | 0 | 2,000 |
| BTG, Inc. (Phase I) | FFP | June 00 | 2,000 | 2,000 | 2,000 | 0 | 0 | 0 | 0 | 2,000 |
| TRW, Inc. (Phase I) | FFP | June 00 | 2,000 | 2,000 | 2,000 | 0 | 0 | 0 | 0 | 2,000 |
| BTG, Inc./Titan (Phase II) | CPAF | May 01 | 59,323 | 59,323 | 10,200 | 9,378 | 34,084 | 10,985 | Continuing | TBD |
| Raytheon | FFP | Nov 00 | 7,244 | 7,244 | 3,910 | 1,034 | 300 | 2,000 | 0 | 7,244 |
| E-Systems/L3Comm-CMF | | | | | | | | | | |
| SAIC (CMF) | FFP | Sept 02 | TBD | TBD | 400 | 1,208 | 646 | 681 | 0 | 2,935 |
| Support and Management O | rganizations | | | | | | | | | |
| MITRE/ITSP | CPFF | Oct 98 | TBD | TBD | 7,486 | 4,921 | 2,760 | 2,200 | Continuing | TBD |
| Test and Evaluation Organiz | | | | _ | | | | | | |
| JITC/46th OSS | MIPR | Ongoing | TBD | TBD | 380 | 98 | 600 | 600 | Continuing | TBD |
| | | | | | | | | | | |
| Ducie et 4770 | | | <i>T</i> | F C C F | | | | F 1 " | - H D O /DE / | 20000505\ |
| Project 4778 | | | Pag | e 5 of 6 Pag | ges | | | Exnit | oit R-3 (PE | J0U385UF) |

| RDT&E PF | ROGRAM ELI | EMENT/F | ROJECT C | OST BREAKDO | WN (R-3) | DATE F (| 2003 | | |
|---|--|------------------------|-------------------------------|------------------|------------------------|-----------------|---------|---------------|---------------------------------------|
| JDGET ACTIVITY 4 - Advanced Comp ACD&P) | PE NUMBER AND TITLE 0603850F Integra | ated Broa | /ice (DEM/VAL) | | PROJECT 4778 | | | | |
| Government Furnishe | ed Property: Contract Method/Type or Funding | Award or Obligation | Delivery | Total Prior | <u>Budget</u> | Budget | Budget | Budget to | Tot |
| <u>Item</u> Description | <u>Vehicle</u> | <u>Date</u> | <u>Denvery</u> <u>Date</u> | to FY 2002 | FY 2002 | FY 2003 | FY 2004 | Complete | · · · · · · · · · · · · · · · · · · · |
| Product Development F | | Date | Date | <u>t011 2002</u> | 1 1 2002 | 11 2003 | 112004 | Complete | <u>110g1</u> |
| TBD | <u>Toperty</u> | | | 0 | | | | Continuing | TE |
| Support and Manageme TBD | * * | | | 0 | | | | Continuing | |
| Test and Evaluation Pro | operty | | | 0 | | | | Continuing | Tl |
| וסט | | | | Total Prior | Budget | Budget | Budget | Budget to | |
| Subtotals | | | | to FY 2002 | FY 2002 | FY 2003 | FY 2004 | Complete | |
| Subtotal Product Devel | opment | | | 20,510 | 11,620 | 35,030 | 13,666 | TBD | |
| Subtotal Support and M | | | | 7,486 | 4,921 | 2,760 | 2,200 | TBD | |
| Subtotal Test and Evalu | ation | | | 380 | 98 | 600 | 600 | TBD | T |
| Total Project | | | | 28,376 | 16,639 | 38,390 | 16,466 | TBD | T |
| | | | | | | | | | |
| Project 4778 | | | $\mathbf{p}_{\mathbf{a}i}$ | ge 6 of 6 Pages | | | Fxhil | oit R-3 (PE (|)603850F |