

Minimum Essential Emergency Communications Network (MEECN)

The Minimum Essential Emergency Communications Network (MEECN) provides secure, high fidelity, jam resistant and survivable communications links between the National Command Authorities (NCA) and the the Strategic Nuclear Forces throughout all phases of strategic conflict.

SUSTAINMENT PROGRAMS

- o Miniature Receive Terminal (MRT)
- o Surviable Low Frequency Communications Systems (SLFCS)
- o Ground Wave Emergency Network (GWEN)

DEVELOPMENT PROGRAMS

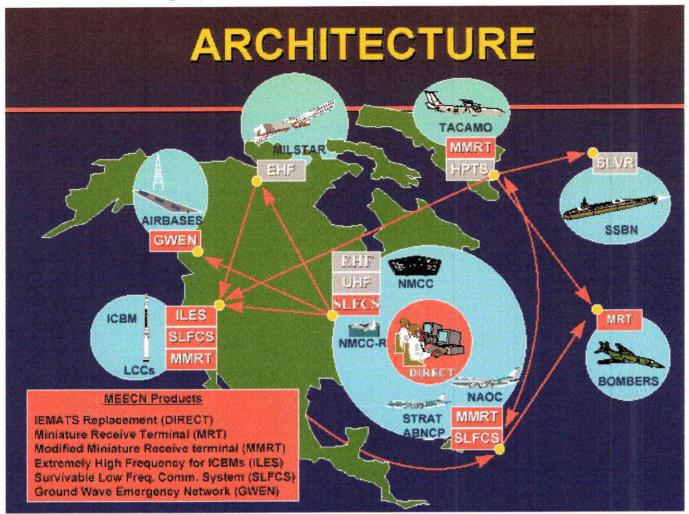
- o Defense IEMATS Replacement Command and Control Terminal (DIRECT)
- o ICBM LCC EHF System (ILES)
- Modified Miniature Receive Terminal (MMRT)

Three projects within this program are under development; DIRECT, EHF and MMRT.

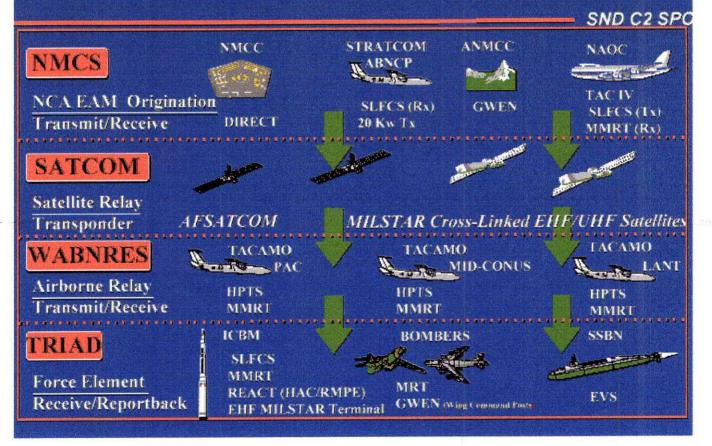
DIRECT, or Defense IEMATS Replacement Command and Control Terminals, transitions the current command and control system from AUTODIN to Defense Message System (DMS).

The Extremely High Frequency (EHF) project will provide a modernized receive/transmit EHF link from the NCA to the ICBM LCCs.

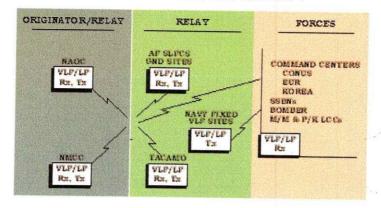
The Miniature Receive Terminal, provides the NCA and nuclear CINCs with survivable C2 link to B-1 and B-52 bombers at the positive control turn around point (PCTAP) for emergency action message (EAM) communications. The Modified Miniature Receive Terminal, or MMRT, will provide the ICBM LCCs and airborne command centers with a common, JCS standard High Data Rate (HIDAR) capability for transmitting/receiving NCA directives. This state-of-the-art upgrade to the Miniature Receive Terminal provides a survivable very low frequency communications receive capability over the MEECN. The MMRT enhances National Command Authority positive control over the strategic forces by meeting the Joint Chiefs of Staff (JCS) MEECN interoperability requirements. A key factor meeting this requirement is the incorporation of the HIDAR message processing algorithm to receive terminals for the E-4B, E-6B, ICBM LCC's and bomber platforms. MMRT capitalizes to the advanced demodulation and signal processing techniques, message processing techniques, and anti-jam capabilities of the MRT to ensure reception of NCA Emergency Action Messages.



END-TO-END CONNECTIVITY LINKING THE NCA TO THE WARFIGHTER



MEECN VLF/LF NETWORK CONCEPT



TECHNICAL DESCRIPTION

- Requirement: Non-Acquisition Program Definition Document (NAPDD) October 1994
- Basic Description of System: Identify and Develop Improvement to the MEECN IAW Requirements and Changing Threats as Directed by USSTRATCOM/JCS via CNO
- Program Scope:
 - Design and Develop MEECN Modes for Tri-Service Deployment
 - Introduce Technical Advancements.
 - Perform System Architecture Studies.
 - Provide Support to CNO/JCS/USSTRATCOM on MEECN Issues.
 - Develop and Promulgate Mode Standards.
 - Conduct/Support Interoperability Tests/Certification and Maintain/Control the Baseline Configuration.
 - NRaD does the Development and is Responsible for CM/CCB.

Sources and Resources

FAS | Nuke | Guide | USA | C3I |||| Index | Search | Join FAS

http://www.fas.org/nuke/guide/usa/c3i/meecn.htm

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