

PACE Communications Card (MDS2)

I. Mission Function – Command and Control (Division ↔ Brigades; Division & Above)

Primary. MSS/CPCE federated rooms

Rooms: MDS2_CMD, MDS2_INTEL, MDS2_FIRES

Use: COP, FRAGOs, graphics, files <1 MB

Auth: CPCE crypto banner + 8-char rolling token announced at first check

Alternate. WGS SATCOM VSAT time-burst bridge → CPCE light mode

Equipment: AN/PRC-117G VSAT; 30–60 s transmit windows

Use: metadata only, no free text

Auth: SATCOM banner token + two-word challenge/response

Contingency. Link-16 J-series via coalition gateway; pLEO VSAT if available; masked LTE/5G exfil

Use: tracks and mission metadata only

Auth: Link-16 crypto + node ID

Emergency. HF ALE 3G to higher; physical courier or LNO; paper FRAGOs

Auth: Preplanned physical token (unit stamp/ink signature) + oral password

Note: Runners carry one-line FRAGOs and printed WGS-84 grids

II. Mission Function – Fires (ASCA/AFATDS/AXS and Voice/Paper Fallbacks)

Primary. ASCA bridge → AFATDS v7/AXS; CDS policy “Coalition – Fires Metadata Only”

Datum/precision: WGS-84 MGRS, 8-digit minimum

Auth: ASCA mission ID visible both sides

Alternate. Link-16 J-series target exchange via UK gateway (J3.5/J5) → AFATDS/AXS ingest

Use: pre-scheduled TOT windows

Contingency. Voice FSE on SINCGARS (7-line format)

Require: PID, adjacent check via voice or runner

Say the datum first

Emergency. Paper fire card via runner + Black Hornet checksum

One blink = within 50 m; two blinks = no-go

CDS Logging and Rollback.

Logging: “Mission” level, record mission ID, origin, conversion flag

Rollback authority: DIV CDR or XO; executed by S6/NetOps in presence of Fires OIC.

If anomalous impacts or grid drift >100 m, rollback to “U.S. Only – Local Fires” and revert to voice/paper until after-action

III. Mission Function – ISR / Edge Cueing

Primary: ATAK multicast on TSM MANET (AN/PRC-163) room ISR_EDGE

Alternate: Attritable fixed-wing UAS courier carrying ATAK GPX

Contingency: SMS burst on LTE under cover; encrypted short text on WGS SATCOM

Emergency: Hand-drawn overlay; Black Hornet checksum for target confirmation

IV. Mission Function – Sustainment / LOGFAS / MEDEVAC

Primary: MPE/LOGFAS LOGREP push (includes Application Programming Interface (API) from GCCS-A);

Alternate: Email attachment via masked LTE node to division distro

Contingency: Voice LOGREP to 64 BSB RTO; courier manifest

Emergency: Paper LOGREP carried by convoy/host-nation liaison

MEDEVAC

Primary: SINCGARS MEDEVAC net; 9-line format

Alternate: WGS SATCOM burst text (brevity)

Contingency: HF ALE 3G voice

Emergency: Panel/flare + runner; flare codes per ACO fragment

V. Mission Function – Airspace Control (Division A3/Air)

Primary: Positive control via ACO/ACP updates on MSS/CPCE

Alternate: Time-block procedural control published by FRAGO (ACAs, ROZ-AMBER for MEDEVAC, HIDACZ “RIDGE” on call)

Contingency: Voice fragment on SINCGARS: “No-drone,” “MEDEVAC Amber,” “CAS West of MAPLE,” with altitude/time gates

Emergency: Pyro/flare codes to open MEDEVAC lane; GBAD optical only unless air picture clean

Authority to change ROZ/HIDACZ status: Division G3 Air or delegated Airspace Control Authority, announced by FRAGO line with exact times.

VI. External Links – Division to Higher, NATO, and Adjacent

Division ↔ V Corps

Primary: MSS/CPCE federated room (MDS2_CMD)

Alternate: WGS VSAT bridge

Contingency: Link-16 J-series via corps gateway

Emergency: HF ALE 3G and courier to corps liaison cell

Division ↔ USAREUR-AF (Theater / MCLCC)

Primary: MSS/CPCE federated room “RP-C_MCLCC_CMD” with Maven COP; identity-partitioned role access (fires, sustainment, intel)

Alternate: WGS SATCOM VSAT (burst windows) to USAREUR-AF Wiesbaden node; CPCE light mode metadata sync only

Contingency: MPN alternate tunnel; encrypted email (NIPR/SIPR equivalents) for short reports

Emergency: HF ALE 3G SITREP voice to USAREUR-AF net; runner/LNO courier with paper FRAGO/SITREP to Corps Liaison in theater hub

Auth: Rolling token + two-word challenge/response; paper handoff requires division stamp/ink signature

Triggers: MSS federation loss >30 min; >50% packet loss sustained; SATCOM denial across 2 cycles → shift to Alternate. If Alternate unavailable >1 hr → move to Contingency

Division ↔ JFC Brunssum / NATO Allies

Primary: Federated MSS/Maven COP, role-based rooms, metadata only

Alternate: Protected VSAT E2E link under coalition NetOps

Contingency: NATO MPE alternate path or encrypted diplomatic email

Emergency: LNO hand-delivery of paper SITREP

VII. Triggers to Shift Paths

Primary → Alternate: two consecutive missed H+00/15/30/45 net checks; >50% packet loss for 10 min; GNSS spoof/PNT alarm; ASCA queue delay >60 s or RED import flag

Alternate → Contingency: SATCOM window denied >45 min; coalition gateway denial >5 min; LTE node compromise

Shift to Emergency: positive crypto spoof or token failure (two attempts); simultaneous SATCOM & Link-16 denial; life-saving action required immediately

VIII. Authentication and Session Control

Rolling token (8-char) issued every 6 hrs; announced at first check

Two-word challenge/response, changed daily, pocket card carried

Voice fallback = plain language auth phrase + call sign

Paper = unit stamp or ink signature; runner/LNO logs chain of custody

IX. Operator Rules of Behavior

State datum every time: “WGS-84 MGRS, eight-digit”

Read back grids; minimum 8-digit, use 10-digit only with latency <3 s and PID confirmed

Black Hornet checksum for paper/voice fires: one blink good, two blinks no-go

SATCOM transmissions ≤30 s; attachments <1 MB; metadata only on coalition links

If uncertain, execute commander’s intent within guardrails; PID required

X. Net Discipline and Data Standards

Net checks at H+00/15/30/45 on Primary; miss twice = auto-shift to Alternate and report

File naming: unit_function_timeZ.gpx or .xml

Data standards: WGS-84 MGRS, 8-digit minimum; datum announced on initial net call

Logging: NetOps records all path shifts and CDS rollbacks with rationale