

Coalition Fires Quick-Reference (AXS/ASCA/CDS)

(Márquez's laminated card—taped to the top of the rugged tablet.)

Purpose: Pass Polish TOPAZ and UK Bowman exports to U.S. AFATDS via ASCA in a degraded, multinational environment without introducing grid/format errors.

Pre-Conditions

AFATDS v7+ running; AXS node online (preferred for mission build); ASCA service ON. CDS profile set to: “Coalition – Fires Metadata Only” (blocks free text; passes mission metadata).

Datum/Format: WGS-84 MGRS, 8-digit; broadcast datum on initial net call.

Liaison Officers (LNOs) present: Polish Fire Support Officer (FSO), UK fires LNO.

Grid Normalization (Do Every Time)

1. Identify source grid: if export shows OSGB36 or local national grid, stop and convert.
2. Convert to WGS-84: use onboard converter (AFATDS “Geo Tools”) or approved handheld; verify two points against paper map.
3. Set precision: MGRS 8-digit (100 m); go to 10-digit (10 m) only if latency <3 s and PID is confirmed.
4. Checksum: task Black Hornet (nano-UAS) to hover; one-blink “good” = coordinates within 50 m; two-blink “no-go.”

ASCA Pass (TOPAZ → AXS/AFATDS)

TOPAZ operator: export fire mission as “ASCA XML – Coalition.” Ensure fields: Target ID, MGRS, ammunition, method of control (e.g., TOT), remarks (brevity only).

CDS gateway: policy “Coalition – Fires Metadata” ON; logging level “Mission”; auto-scrub free text.

AFATDS operator: import queue “ASCA-IN”; review grid/datum banner—GREEN = fire; AMBER = reconvert; RED = reject and voice the grid.

AXS operator: validate and normalize mission data; if AFATDS queue delay >60 s, cache mission and retry on next window; reconcile AXS thread ID with AFATDS mission ID post-strike.

Voice Fallback (If ASCA Fails)

Use 7-Line fires format over FSE SINCGARS.

Read datum and precision first: “WGS-84 MGRS, eight-digit.”

Require PID and deconfliction (adjacent check or runner) before “Shot.”

CDS/Admin

Authority to set policy: S6 or delegated NetOps chief, witnessed by fires Officer-in-Charge

(OIC).

Log: mission ID, time, origin system, conversion flag.

Rollback: if anomalous impacts or grid drift >100 m observed, switch CDS to “U.S. Only – Local Fires,” revert to voice/paper until after-action is complete.

Common Faults & Fixes

- *Impacts long/short on UK missions.* Likely OSGB36 not converted → re-export, confirm WGS-84 banner in AFATDS.
- *AFATDS rejects mission (RED).* Likely free text in remarks → brevity only.
- *Guns on time, wrong place.* Likely 6-digit grids → enforce 8-digit minimum; re-announce precision.
- *Latency spikes; packets miss window.* Likely jamming peak → hold for lull; use time-burst SATCOM or voice.

Bottom Line: Say the datum out loud, normalize the grid, log the pass, bless the target with the drone—then shoot. AXS threads the mission; AFATDS sends the launch.