SMT Designs Design Notes

Filename nomenclature

[FUNCTION]_[Parameter 1]_[Parameter 2]_[Parameter 3]_[...]_[Parameter N]_[Version]

[FUNCTION] always starts the filename

CR – Device/battery carrier – SHORT/LONG(default normal)

PL – Device/battery platform – SHORT (default normal)

TRAY – Mounting tray for carriers and platforms in a normal avionics bay

EC – Stepped end cap that can include switches, deployment connections and charge canister mounts

MTG – Mounting ring that can include switches, deployment connections and change canister mounts

MNC – Captured nose cone bay parts – 30.5mm end mount or installed in MNC sleeves for larger diameter tubing (requires 38mm coupler tubing for support when mounting in 54mm and above tubing

MDC – Standalone nose cone bay parts - 44mm end mount or installed in MDC sleeves for larger diameter tubing sizes

CC – Charge canister

GSE – Ground support equipment

MNT – Internal eyebolt mount

MTR – Internal motor retainers

STACKED – compressed bay design for shorter bays

TMPL – Template and assistants

Parameters follow but the number of them will change based on the function

[Parameter 1, 2, ...]

[Wall Thickness]

UT – ultra thin walls

T – thin walls

N – normal walls

H – heavy walls

UH – ultra heavy walls

[Tubing Class]

CT – coupler tube (default tubing class)

BT – body tube

[Tubing Size]

BT55

29 – 29mm tubing – 1.1 inch

38 - 38mm tubing - 1.6 inch

BT60 - 40mm tubing 1.7 inch

54 - 54mm tubing -2.1 inch

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65 - 65mm tubing - 2.6 inch
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75 - 75mm tubing - 3 inch

98 - 98mm tubing – 4 inch

144 – 144mm 5.5 inch

200 - 200 mm - 8 inch

[Deployment Support]

DD – dual deploy

- for a normal dual deploy bay this means there is mounting for a charge canister on the part, as well as, two posts for electrical connections
- for nosecone deployment bays, the meaning shifts slightly because the NC bay is single ended, so the support is really single deploy (one switch (SPDT or DPDT), one canister and two connections)

RDD – redundant dual deploy

- for a normal redundant dual deploy bay this means there is mounting for two charge canisters on the part, as well as, four posts for electrical connections
- for nosecone deployment bays, the meaning shifts slightly because the NC bay is single ended, so the support is really dual deploy (one DPDT switch or two SPDT switches, two canisters and four connections)

[Switch Support]

SWITCH – SPDT momentary commercial switch

DPDT – DPDT momentary commercial switch

RADIAL – switch is positioned for arming screw access through airframe

AXIAL – switch is positioned for arming screw access through end of bay (used for non- deployment bays – typically a nosecone bay)

[Nosecone bay length]

C – Compact

S – Short

M - Medium

L-Long