

TDIS Internal Review

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Reviewers:

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- **Low-Z absorber materials:**
 - Do the reviewers support the presented strategy regarding the material selection for low-Z jaws (i.e. graphite to be used unless proven to be non-suited by HRMT-28)?
- **Impedance/vacuum:**
 - Are all the taken measures (improved cooling, RF fingers, vacuum pumps etc.) sufficient to avoid issues like we had with the present TDIs? Do we need a tapering?
 - What is the maximum value of impedance acceptable for the jaws? Is the strategy of non-coated low-Z absorber blocks supported? (note: in case of grazing impact, significant damage of coating is likely to happen)
- **E-cloud:**
 - Is e-cloud an issue? Is a low-SEY coating needed?
- **Instrumentation/interlocks**
 - In terms of gap measurements (in particular for the BETS), is the proposed instrumentation layout enough (using redundant anti-collision LVDTs like on the collimators)?
 - Is more instrumentation needed to make sure that the jaws of the three modules are well aligned with each other?
 - Which measures could be taken to improve the reading accuracy from the temperature sensors? How could EM coupling with the beams be avoided?
- **General:**
 - Is any important aspect neglected in the design?
 - Apart from the usual mechanical and instrumentation tests foreseen on the prototype, are there any other tests that could be performed?