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Initial applications of the non-Maxwellian extension of the fullwave TORIC v.5 code in the mid/high harmonic and minority heating regimes¹ N. BERTELLI, E.J. VALEO, C.K. PHILLIPS, PPPL — A non Maxwellian extension of the full wave TORIC v.5 code in the mid/high harmonic and minority heating regimes has been revisited. In both regimes the treatment of the non-Maxwellian ions is needed in order to improve the analysis of combined fast wave (FW) and neutral beam injection (NBI) heated discharges in the current fusion devices. Additionally, this extension is also needed in time-dependent analysis where the combined heating experiments are generally considered. Initial numerical cases with thermal ions and with a non-Maxwellian ions are presented for both regimes. The simulations are then compared with results from the AORSA code, which has already been extended to include non-Maxwellian ions. First attempts to apply this extension in a self-consistent way with the NUBEAM module, which is included in the TRANSP code, are also discussed.

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