



Density profile location dominant factor in determining pedestal top

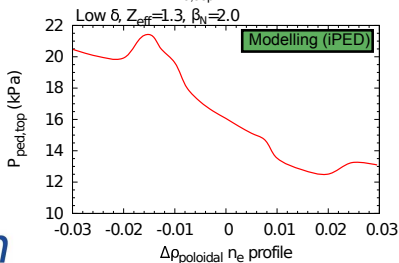
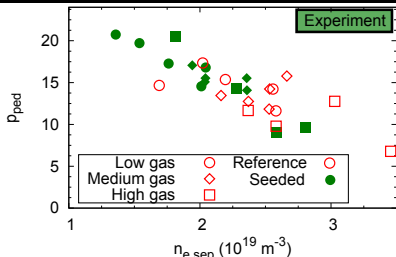


Density profile influenced by high field side high density

- $n_{e,HFSHD} = 10 \times n_{e,sep}$
- Diffusive/drift-based transport: $n_{e,sep} \uparrow$ and density pedestal shifts outwards
- $p_{ped} \propto 1/n_{e,sep}$ (variation in P_{heat} , Γ_D , N_2)

Extended EPED model with n_e shift (iPED)

- Predictive scan of impact on pedestal
- $\Delta\rho_{poloidal} = 0.01 \rightarrow$ pedestal top changes by 25%



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