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Comparative study of nonperturbative heavy quarks in the nucleon TIMOTHY HOBBS, JOHN LONDERGAN, Indiana University, WALLY MELNITCHOUK, Jefferson Lab — We perform an analysis of the role of nonperturbative (or intrinsic) charm in the nucleon. Charm is generated nonperturbatively through Fock state expansions of the nucleon wave function to include five-quark virtual states involving charmed mesons and baryons. We consider contributions from a variety of charmed meson-baryon states and find surprisingly dominant effects from the  $\bar{D}^{*0} \Lambda_c^+$  configuration. Particular attention is paid to the existence and persistence of high-*x* structure for intrinsic charm, and the *x* dependence of the  $c - \bar{c}$  asymmetry predicted in meson-baryon models. We also discuss efforts to constrain intrinsic charm via a forthcoming global QCD analysis, and the possibility of extracting intrinsic strangeness using a similar approach.

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