HP4 Ap stars as progenitors of magnetic white dwarfs

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The progenitors of magnetic white dwarfs are believed to be magnetic Ap and Bp stars because the fields in these stars are structured and are believed to be formed in the core of the star. By assuming that magnetic flux is conserved during the final stages of evolution, we find that Ap/Bp stars are able to explain only the high-field magnetic white dwarfs ($10^7 - 10^8$ G). We also show that magnetic Ap and Bp stars do not generate a sufficient number of magnetic white dwarfs and additional progenitors are required.
