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## **Searches for narrow resonances decaying to pairs of boosted HH bosons**

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We present a search for narrow resonances production in gluon-gluon fusion followed by a decay into two Higgs bosons at 8 and 13 TeV. Decays of Higgs bosons into bottom quark pairs are considered for resonance masses above 1 TeV, where each Higgs boson is produced with large momentum, and the hadronization products of the pair of bottom quarks can usually be reconstructed as single large jets. The background from multijet and  $\Upsilon t$  events is significantly reduced by applying requirements related to the flavor of the jet, its mass, and its substructure. The signal is identified as a peak in the dijet invariant mass spectrum of the remaining background events.

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