

**CMS Preliminary** 35.9 fb<sup>-1</sup> (13 TeV)

tan $\beta$

**2HDM+S type IV**

■ ■ ■ ■ 95% CL on  $\frac{\sigma(h)}{\sigma_{\text{SM}}} B(h \rightarrow aa) = 1.00$

▤ ▤ ▤ ▤ 95% CL on  $\frac{\sigma(h)}{\sigma_{\text{SM}}} B(h \rightarrow aa) = 0.34$

6  
5  
4  
3  
2  
1

20 30 40 50 60

$m_a$  (GeV)

10<sup>2</sup>  
10  
1  
10<sup>-1</sup>

95% CL on  $\frac{\sigma(h)}{\sigma_{\text{SM}}} B(h \rightarrow aa)$

