

One slide on $|\Delta I| = 1$ penguin decays

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$$B_s \rightarrow \phi\pi^0, \phi\rho^0$$

QCD penguins do not contribute to $B_s \rightarrow \phi\pi^0$ and $B_s \rightarrow \phi\rho^0$, which are therefore ideal testing grounds for **Z** penguins.

New physics can enhance the branching ratios by a factor of **5** over the SM values

$$B(B_s \rightarrow \phi\pi^0) = \left(1.6_{-0.3}^{+1.1}\right) \cdot 10^{-7},$$

$$B(B_s \rightarrow \phi\rho^0) = \left(4.4_{-0.7}^{+2.7}\right) \cdot 10^{-7}.$$

Hofer et al., 1011.6319, 1212.4785

