Loxoribine is a guanosine analog derivatized at position N\textsuperscript{7} and C\textsuperscript{8}. It is a potent agonist of the Toll-like receptors 7 (TLR7). The ability of loxoribine to activate TLR7 signaling was validated using a panel of InvivoGen’s reporter cell lines. Loxoribine efficiently activates human (h) and mouse (m)TLR7, but not TLR8, as assessed by the expression of an NF-κB-inducible secreted embryonic alkaline phosphatase (SEAP) reporter in HEK-Blue™-derived cell lines (Figure 1).

**Figure 1.** NF-κB response of HEK-Blue™-derived cells to loxoribine. HEK-Blue™ cells expressing hTLR7, mTLR7, or hTLR8 were cultured in HEK-Blue™ Detection reagent and stimulated with increasing concentrations of loxoribine. After 24h incubation, the NF-κB-induced SEAP activity was assessed by measuring the SEAP level in the supernatant. Data are shown as optical density (OD) at 650 nm (mean ± SEM). Of note, HEK-Blue™ Null* comprises data from the parental cell lines HEK-Blue Null1, HEK-Blue Null1-v, and HEK-Blue Null2-k.