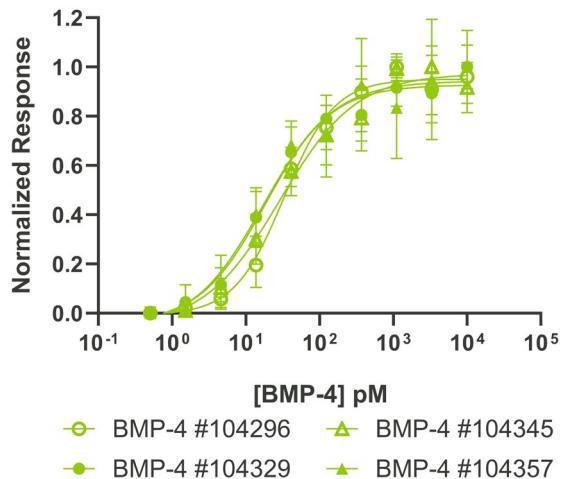


Qkine bone morphogenetic protein-4 produces consistently high bioactivity lot-to-lot

Technote

BMP-4 (Qk038)



Human bone morphogenetic protein 4 (BMP-4) is a key regulator of embryogenesis and supports the differentiation of induced pluripotent stem cells (iPSC) and embryonic stem cells (ESCs). BMP-4 plays a role in bone and cartilage formation, tissue repair, and organ and neuronal development.

BMP-4 is part of the TGF- β superfamily and has a complex biochemical structure, expertise is required to manufacture bioactive BMP-4. Qkine BMP-4 (Qk038) has exceptional lot-to-lot consistency.

Qkine BMP-4 (Qk038) lot validation

- ▶ Four independent lots of BMP-4 (Qk038) were tested using a BMP-4 responsive firefly luciferase reporter assay.
- ▶ Qkine recombinant human BMP-4 lots show a narrow bioactivity range across the four batches of 17-34 pM.

Qkine BMP-4 (Qk038) is highly pure, bioactive and animal origin-free. Qkine tests all newly manufactured lots against previous lots ensuring exceptional lot-to-lot consistency and allowing increased reproducibility for stem cell culture and differentiation.

Qkine BMP-4 (Qk038) protein has exceptional lot-to-lot consistency.

Bioactivity was determined using a BMP-4-responsive firefly luciferase reporter assay in stably transfected HEK293T cells. Cells were treated with a serial dilution of four independent lots of BMP-4 for 6 hours in triplicate.