Validation data for GlcC₁₄C₁₈

https://www.invivogen.com/glc-c14c18

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Glucosyl-6-tetradecyloctadecanoate (GlcC₁₄C₁₈) is a C₆-branched glycolipid that activates the macrophage-inducible C-type lectin (Mincle) receptor. This glucose monoester was developed using a rational design to obtain a structurally simple molecule that binds and activates Mincle. Upon GlcC₁₄C₁₈ recognition, Mincle interacts with the Fc receptor common γ -chain (FcR γ) triggering Syk-CARD9-dependent signaling and NF- κ B activation. Stimulation of InvivoGen's HEK-BlueTM hMincle reporter cells with GlcC₁₄C₁₈ results in a dose-dependent induction of the NF- κ B signaling pathway.



Evaluation of GlcC₁₄C₁₈ in HEK-Blue[™] hMincle cells

GlcC₁₄C₁₈ induces a dose-dependent response in HEK-Blue[™] hMincle cells.

HEK-Blue[™] hMincle cells were stimulated with increasing concentrations of $GlcC_{14}C_{18}$ and trehalose-6,6-dimycolate (TDM, also known as cord factor), an extensively studied Mincle agonist. After overnight incubation, the NF- κ B response was determined using QUANTI-Blue[™], a SEAP detection reagent, and by reading the optical density (OD) at 630 nm.

