

## **Tales of 1,008 Small Molecules: Phenomic Profiling through Live-cell Imaging in a Panel of Reporter Cell Lines**

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# Co-first authors

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<sup>3</sup> MilliporeSigma, Saint Louis, MO, USA

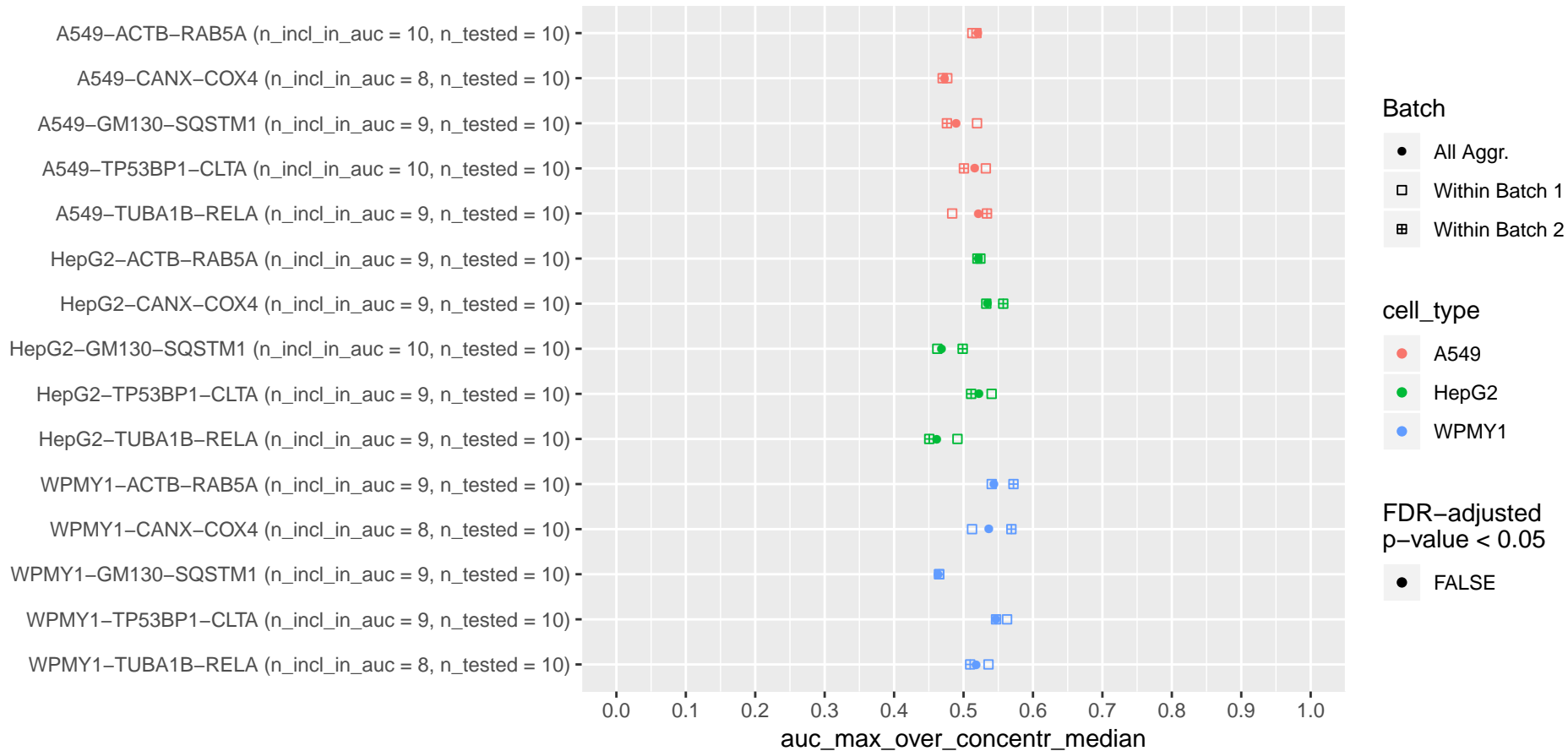
<sup>4</sup> Present address: Recursion, Salt Lake City, UT, USA

\* Corresponding author: Steffen Jaensch, Janssen Pharmaceutica N.V., Turnhoutseweg 30, 2340 Beerse, Belgium, SJAENSCH@its.jnj.com

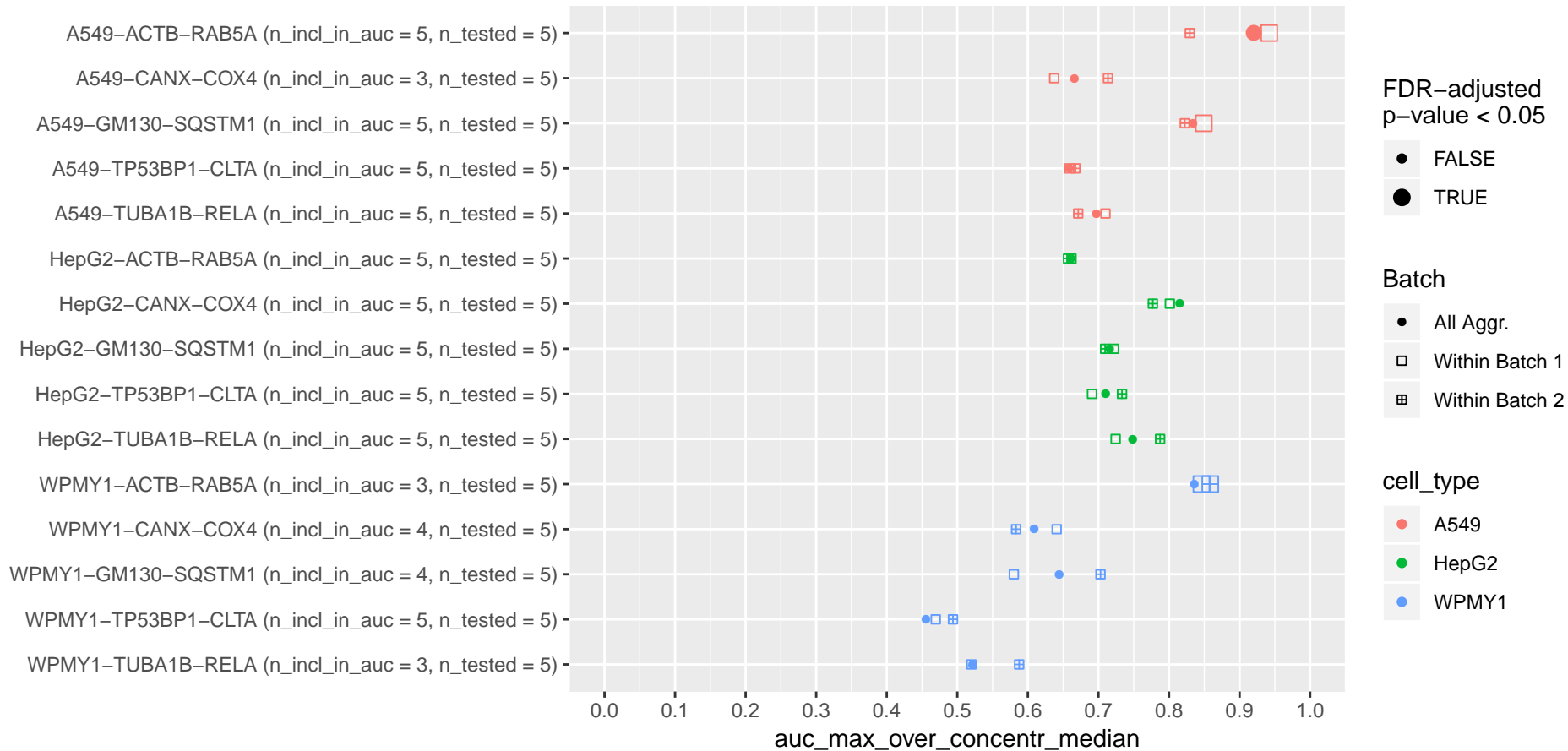
### **Supplementary Figure S8**

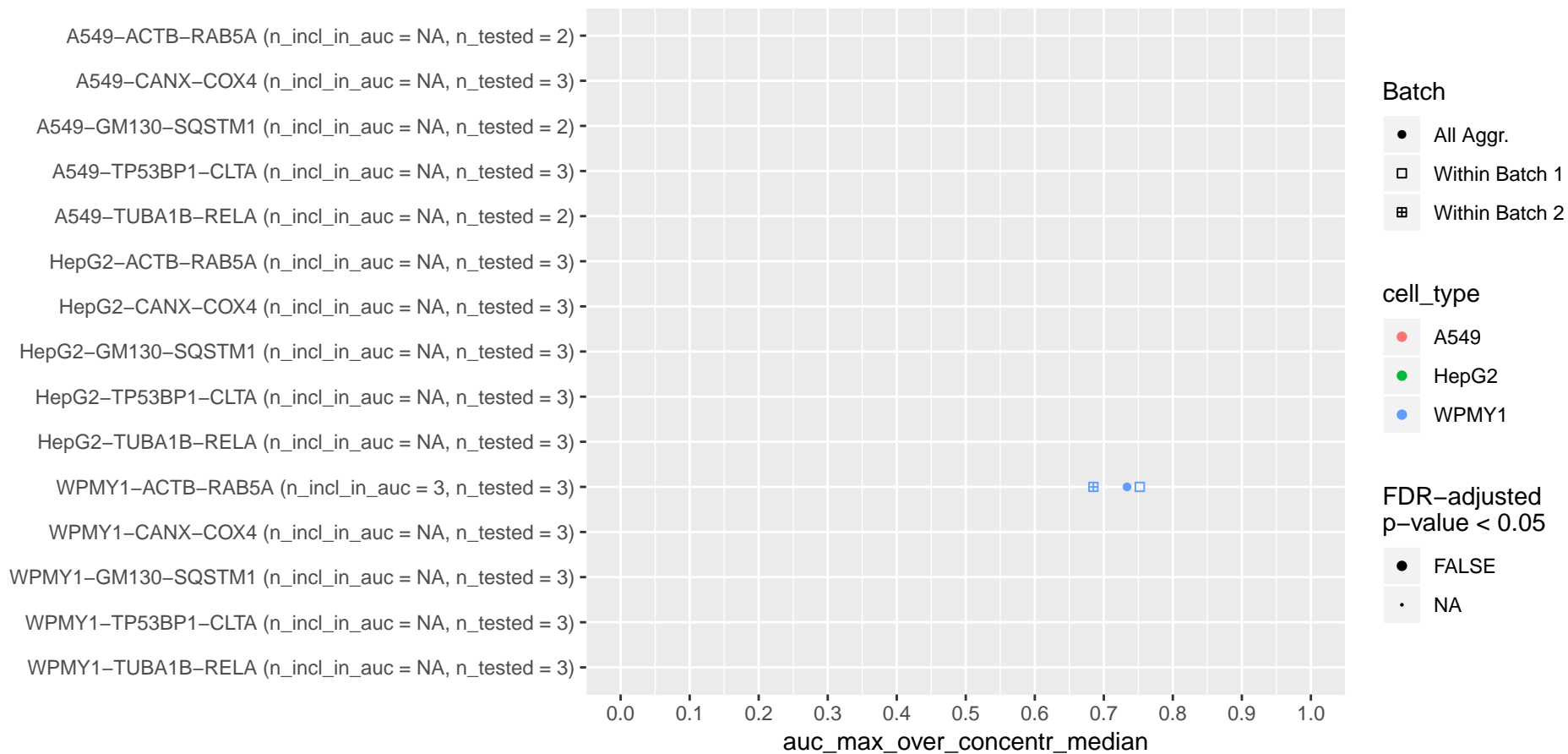
Graphical representation of the AUC-ROC values for all 83 MoAs with  $\geq 3$  active compounds. These AUC-ROC values are also listed in Supplementary Table S4.

# ABL1<sup>inhibitor</sup>

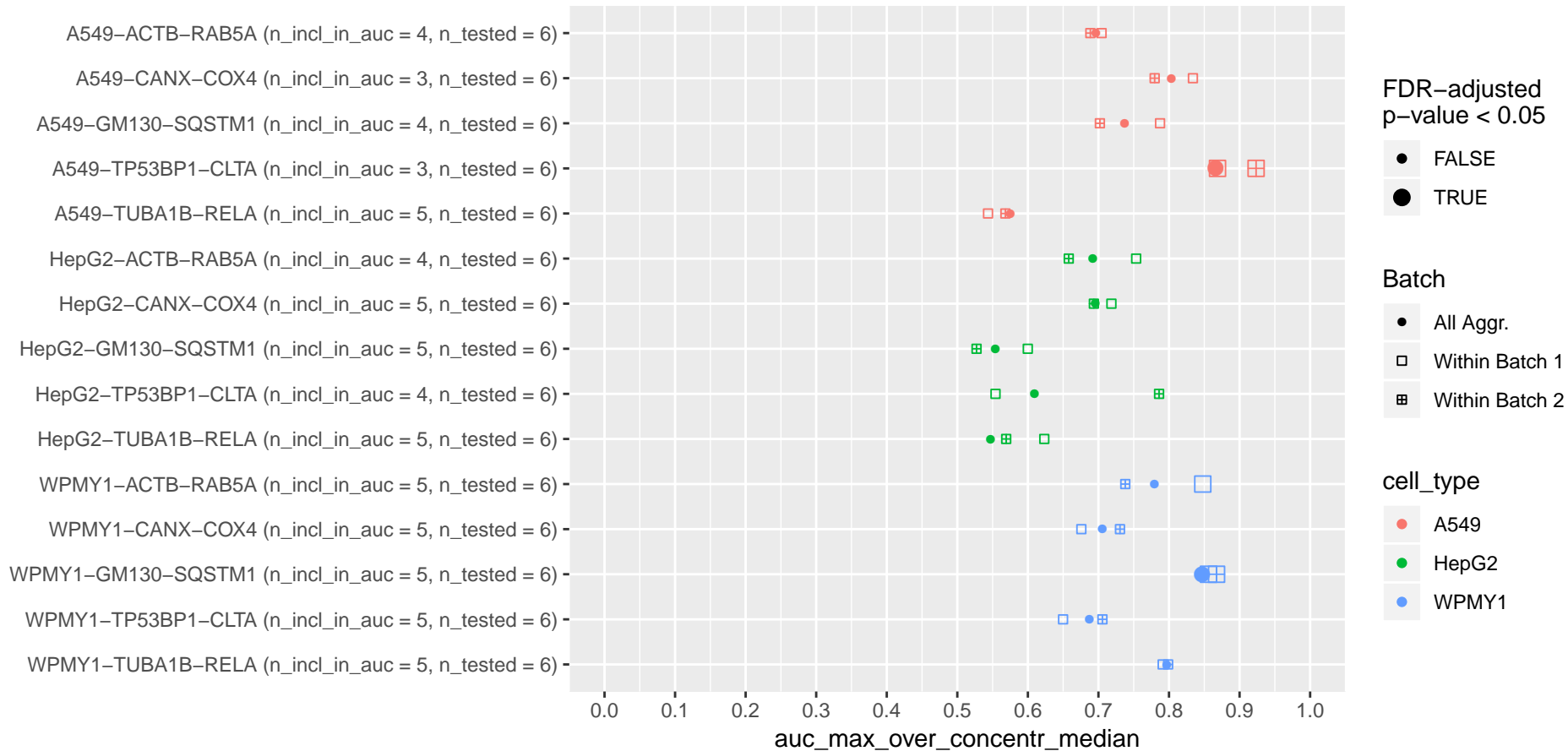


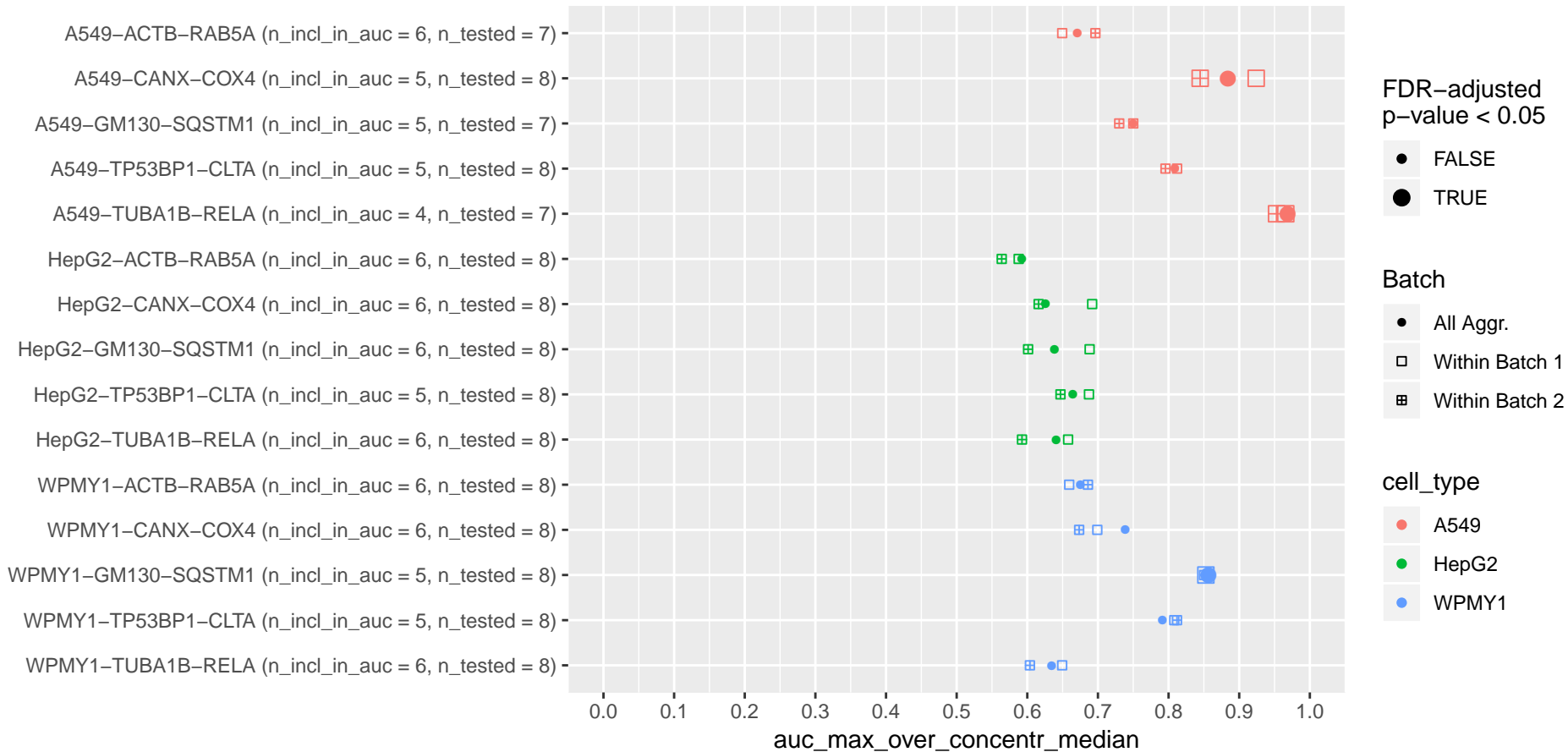
# ALK/LTK family^inhibitor



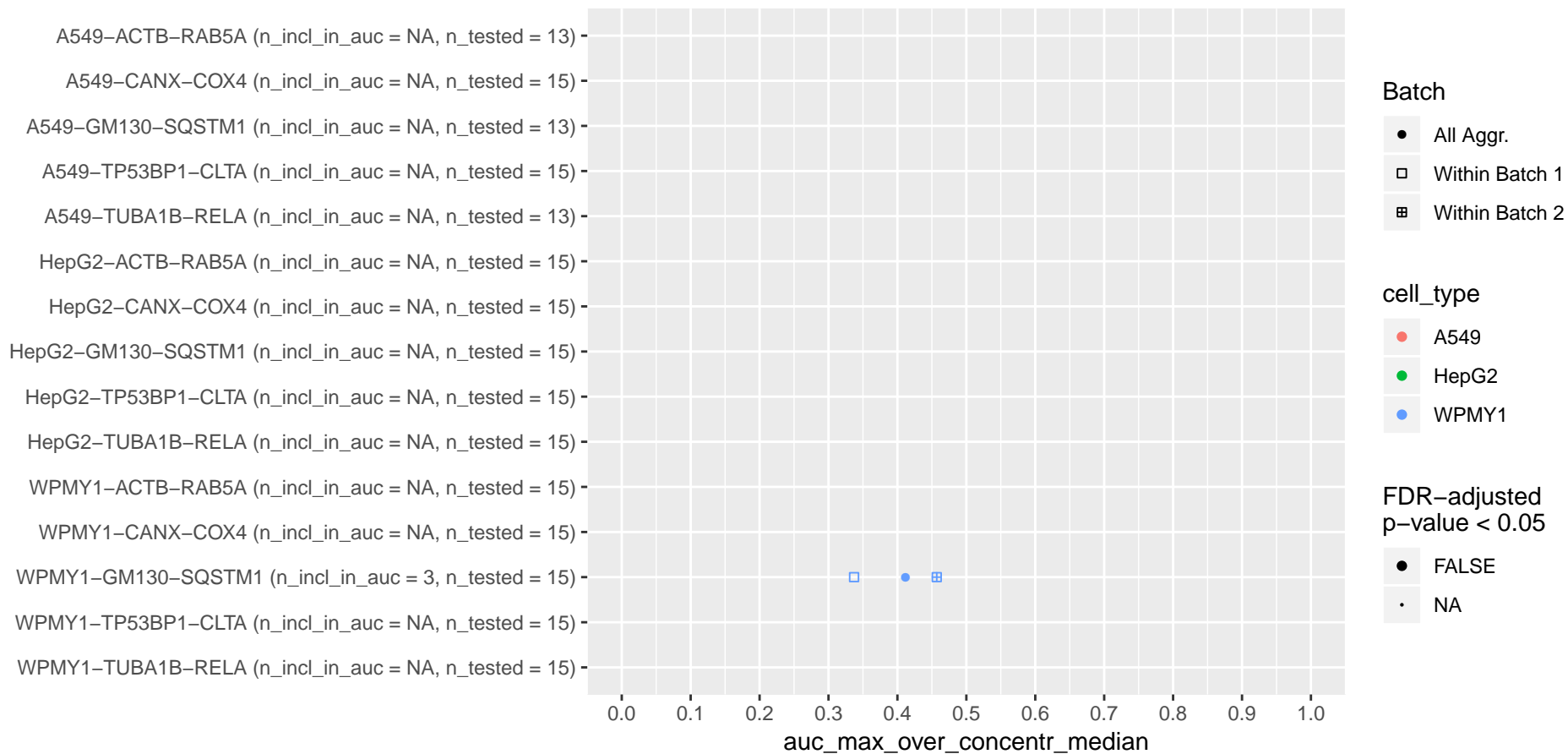
ATM<sup>hi</sup>inhibitor

# Actin<sup>inhibitor</sup>

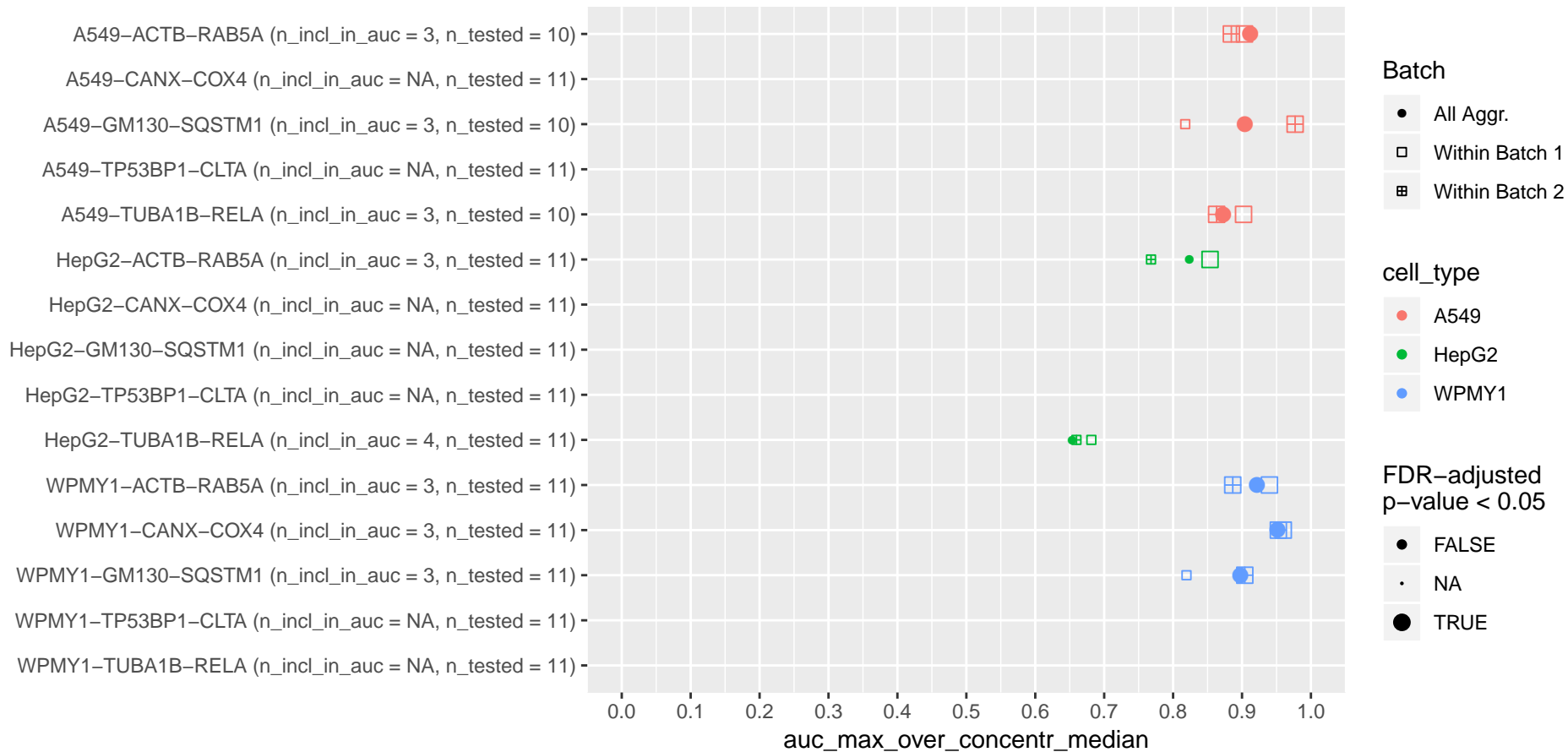


Akt<sup>inhibitor</sup>

# Alpha-adrenergic receptor^agonist

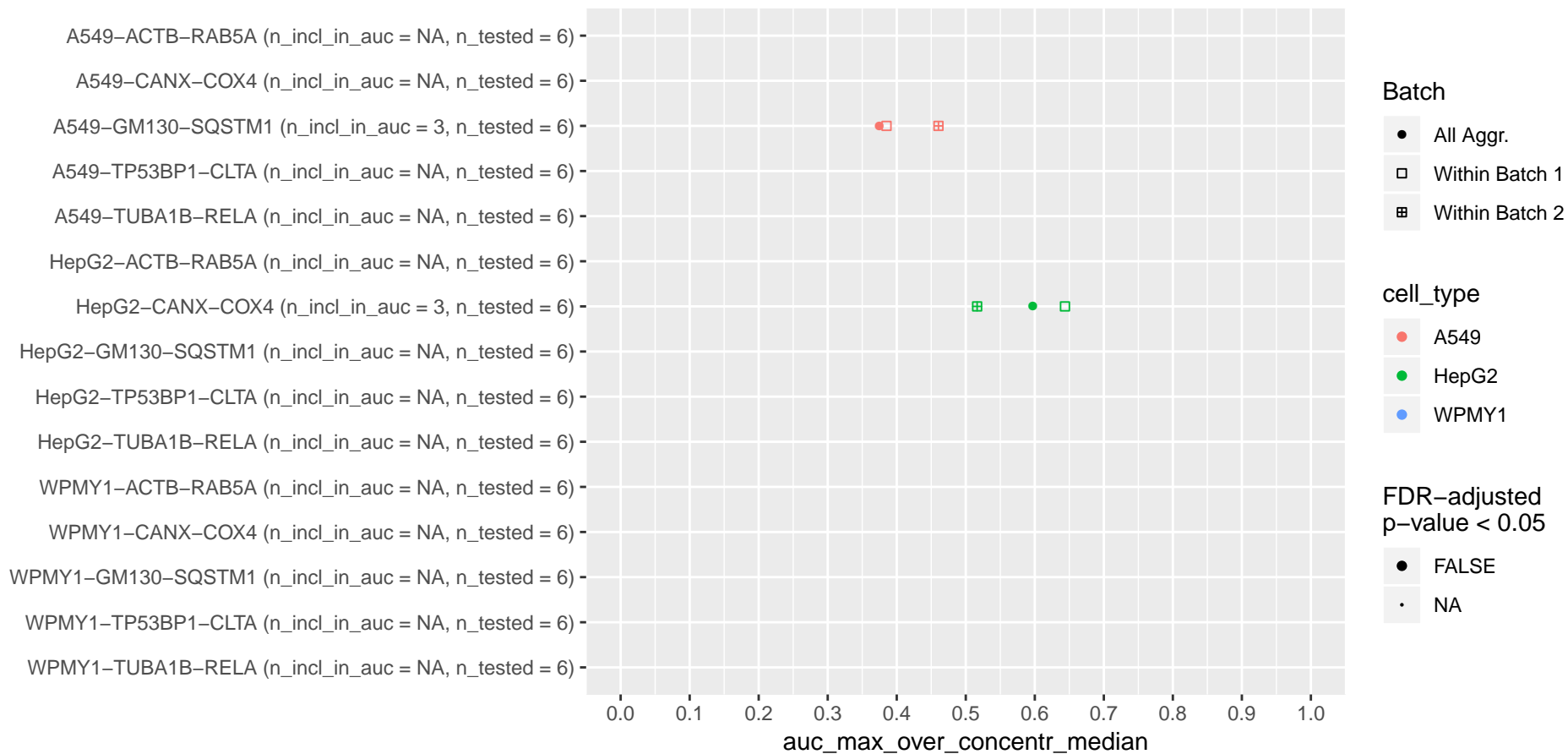


# Alpha-adrenergic receptor^antagonist

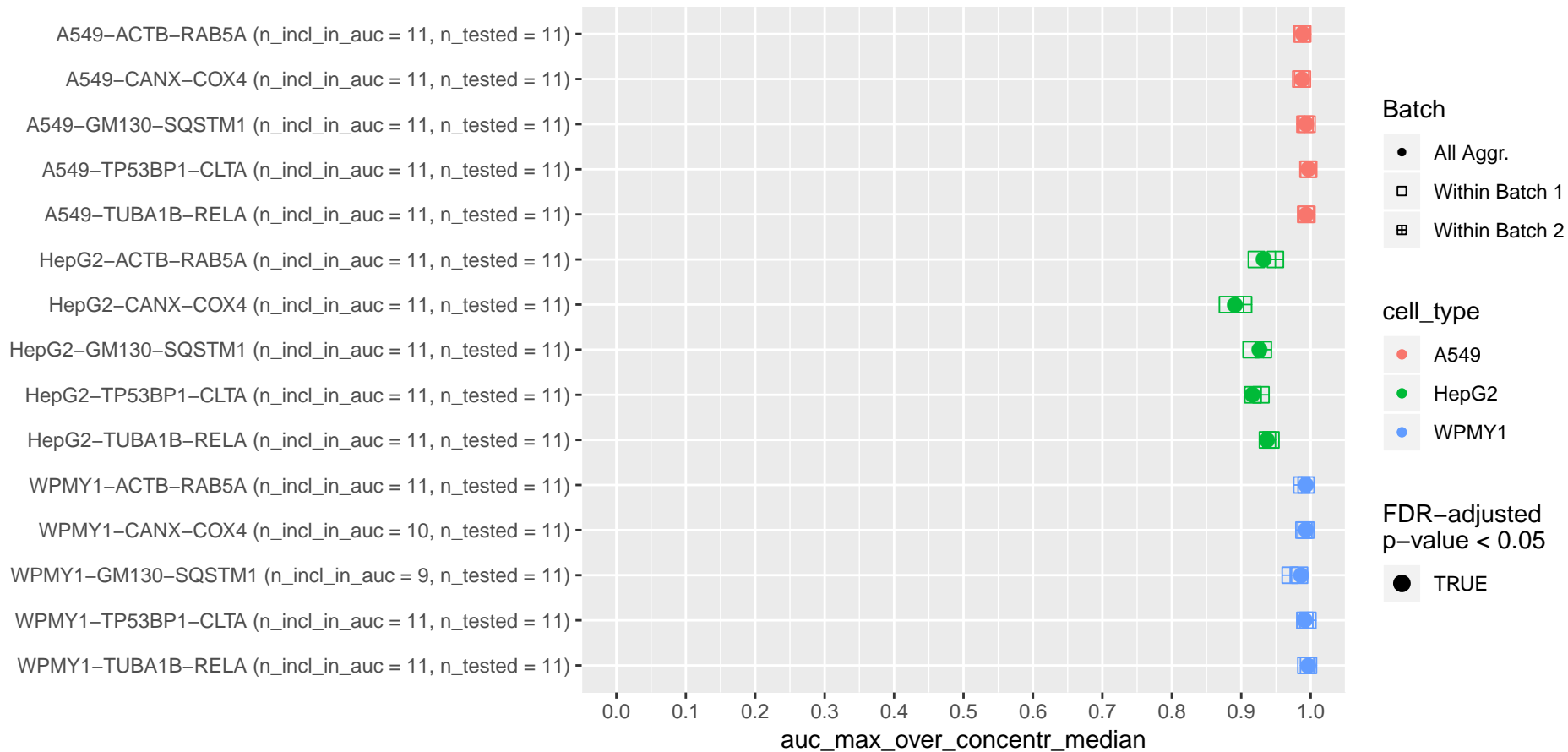




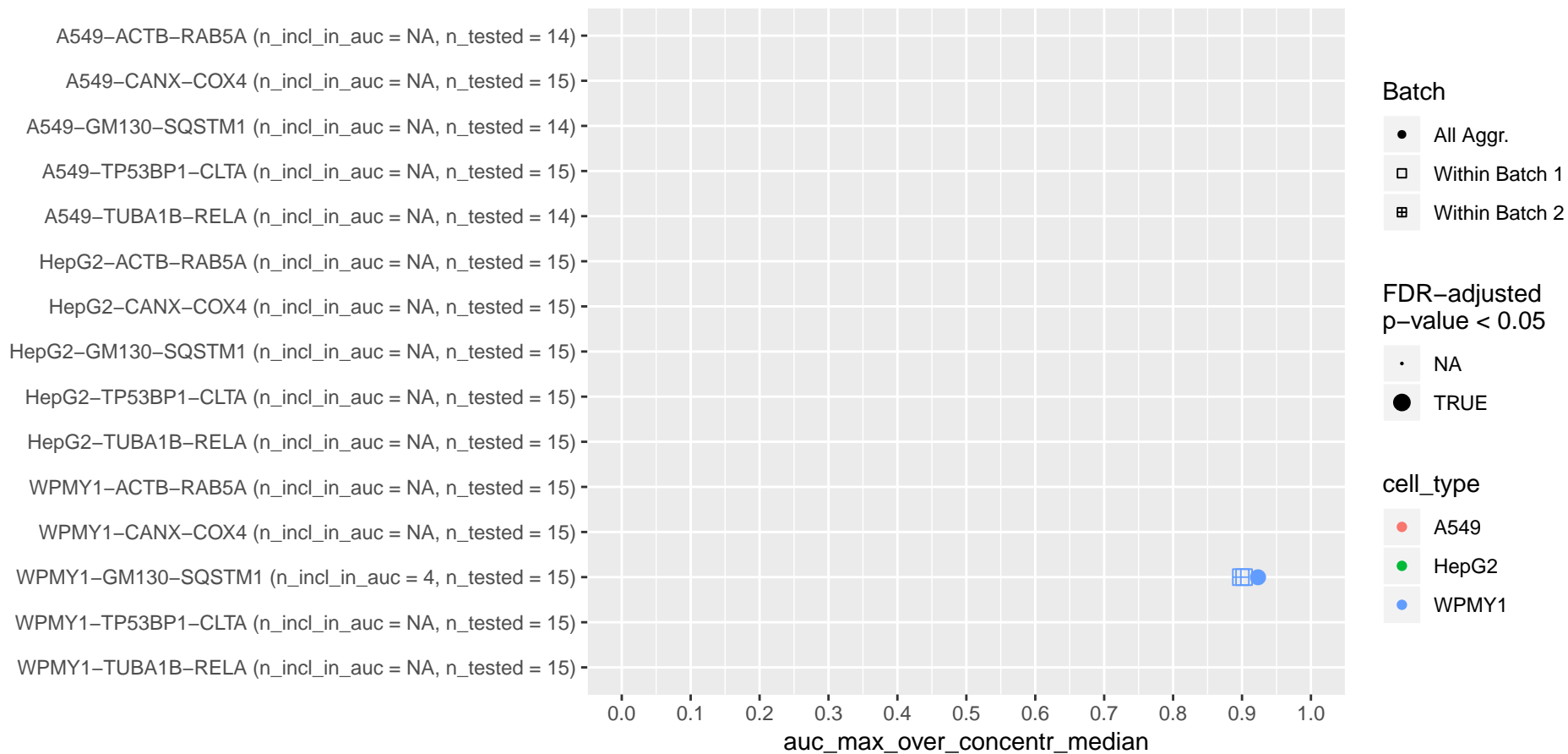
# Anti-microbial^agent



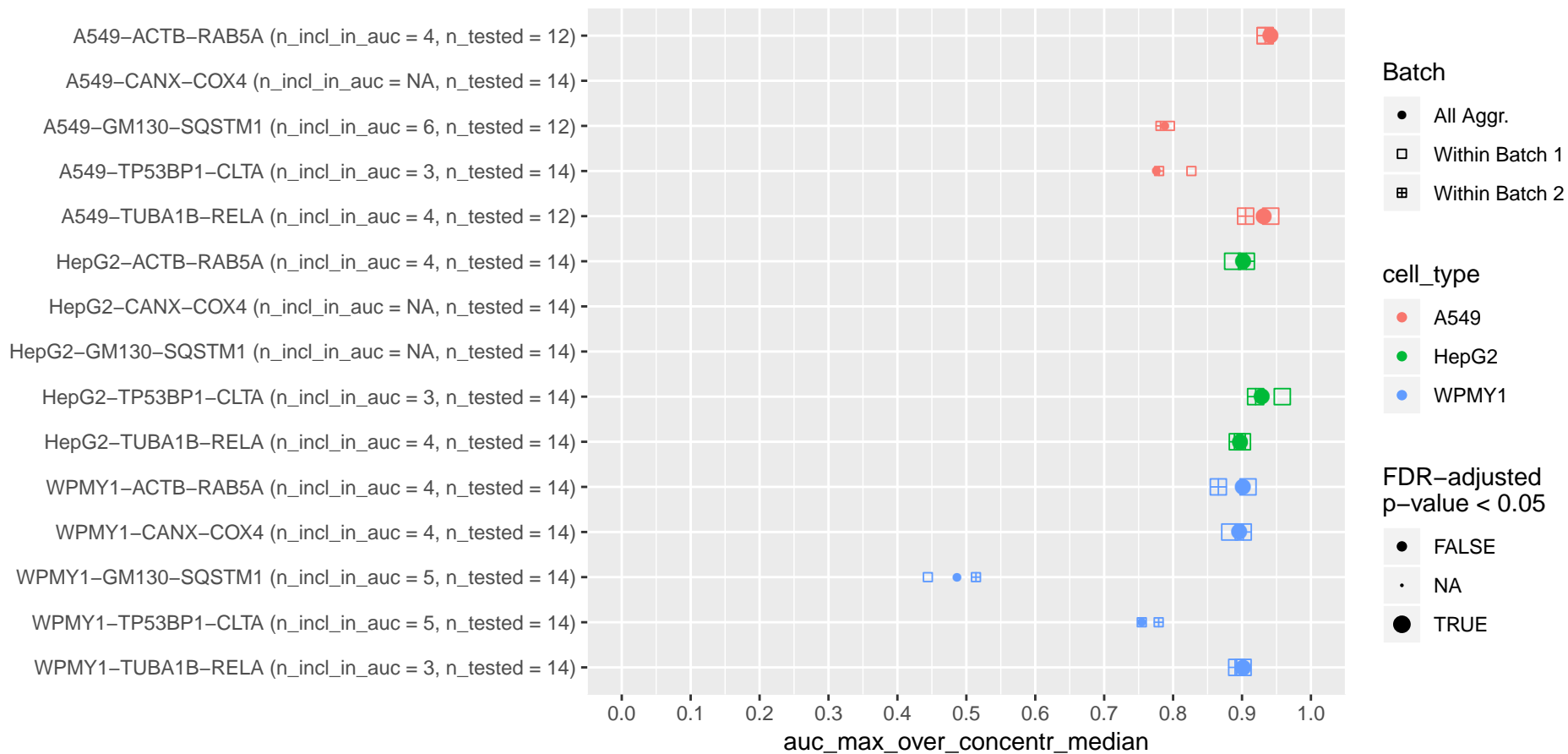
# Aurora kinase<sup>inhibitor</sup>



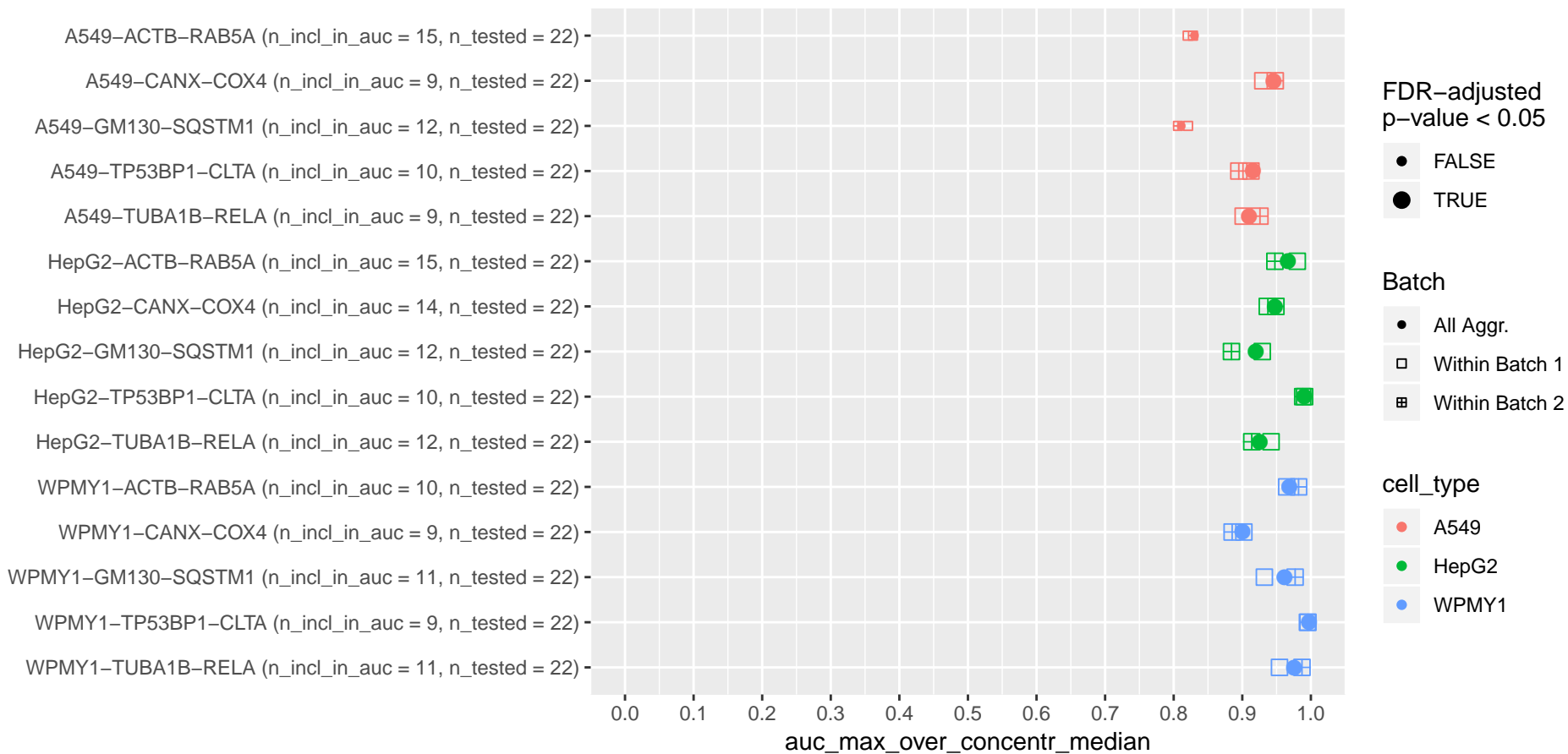
# Beta-adrenergic receptor^agonist



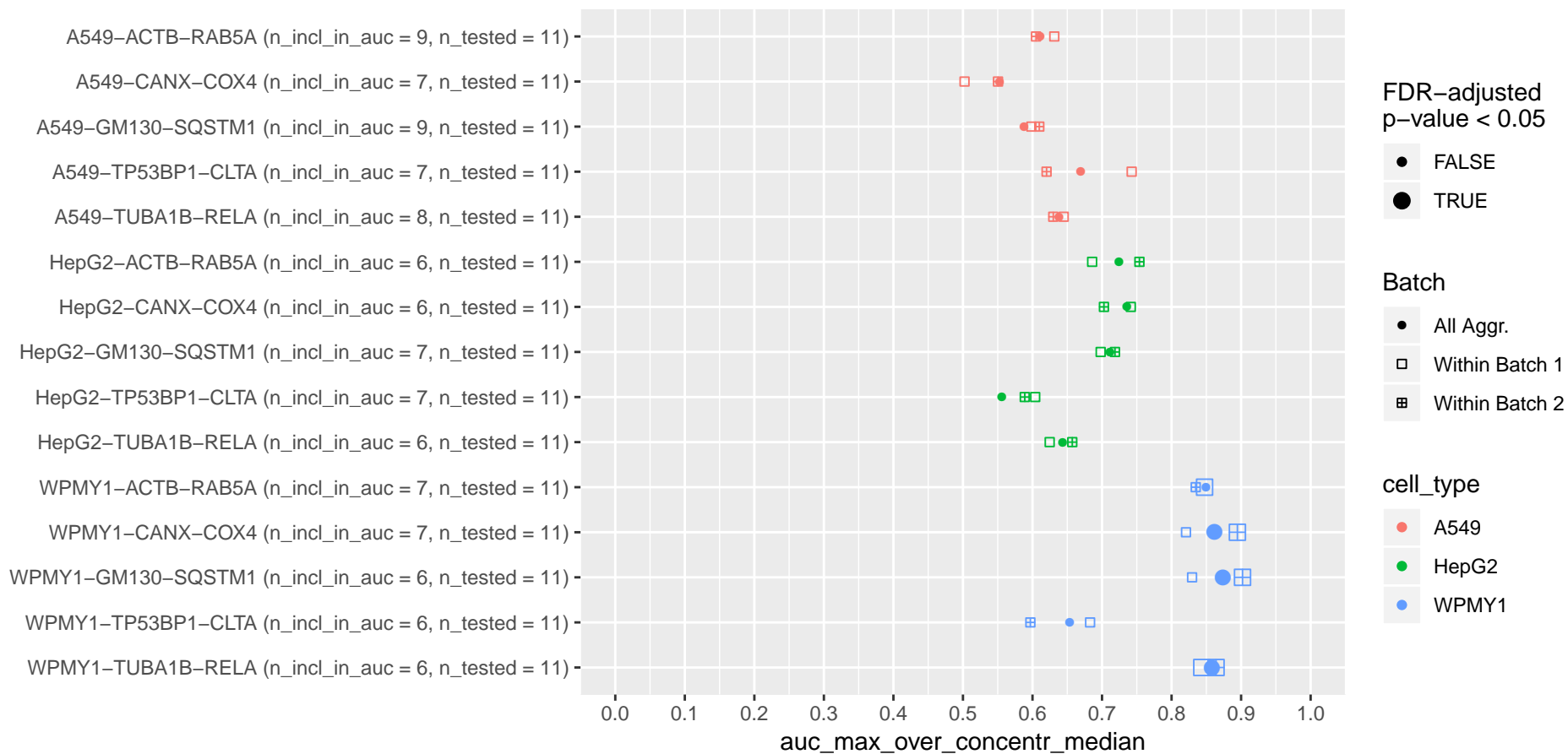
# Beta-adrenergic receptor^antagonist



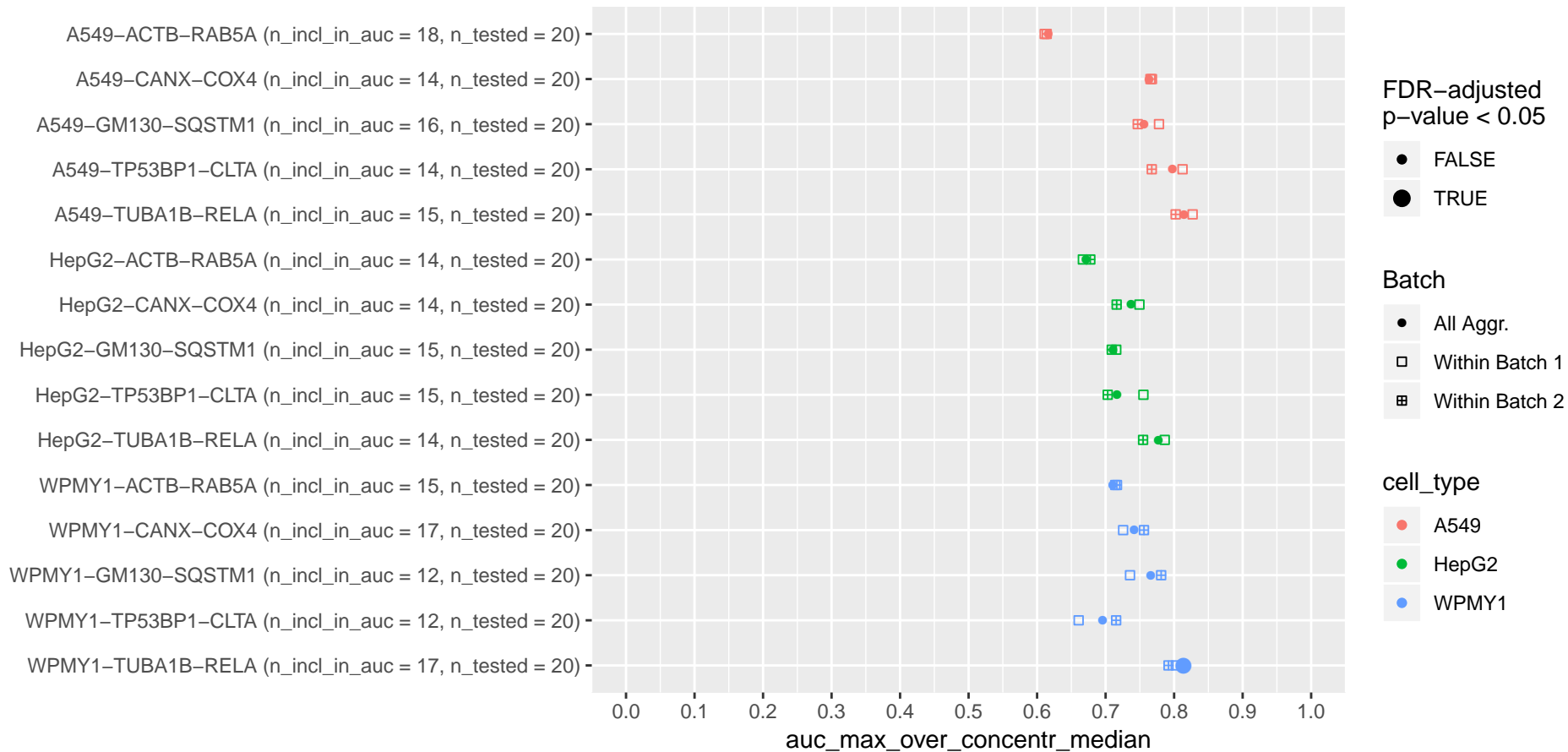
# Bromodomain<sup>inhibitor</sup>



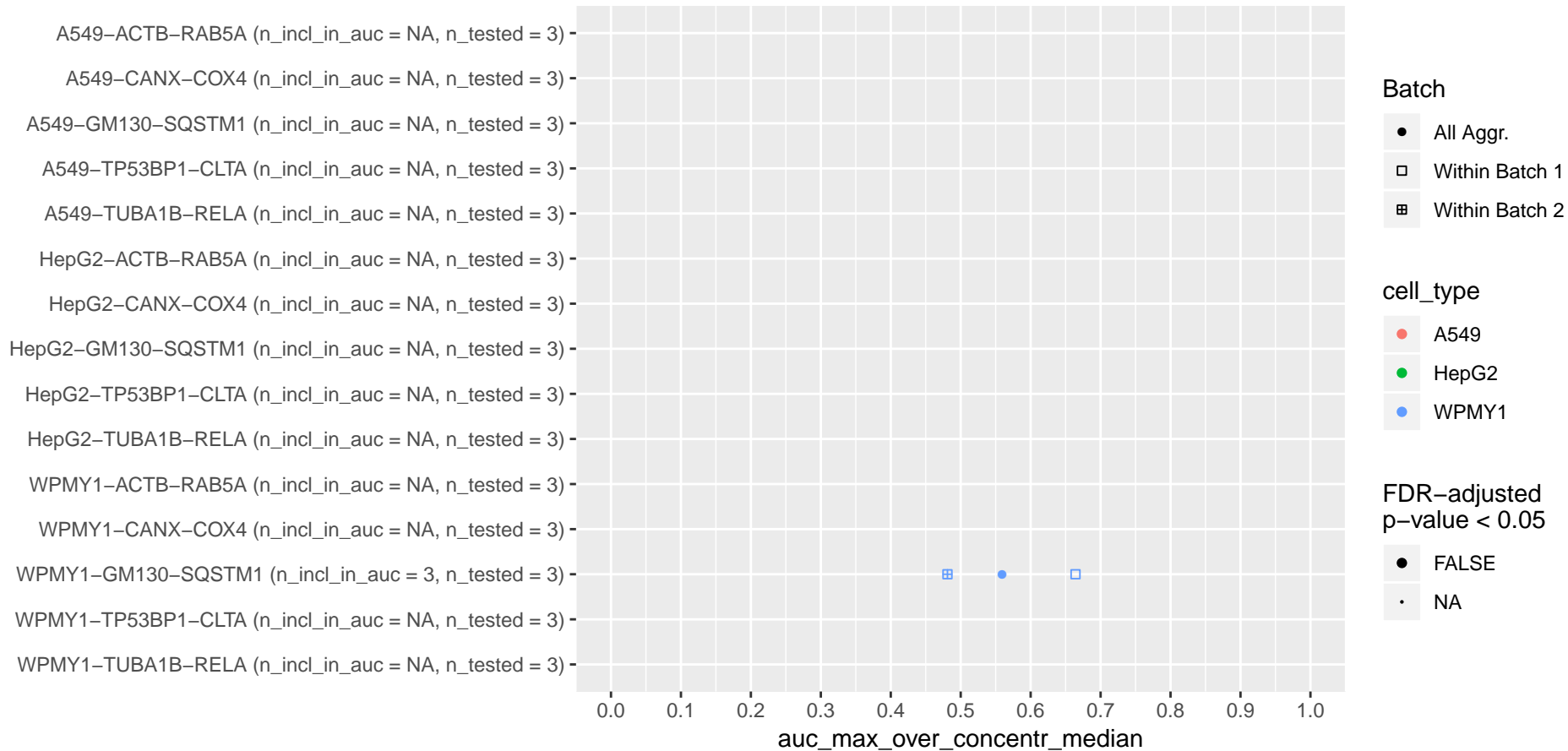
# Brutons Tyrosine Kinase/Tec family^inhibitor



# CDK<sup>in</sup>hibitor

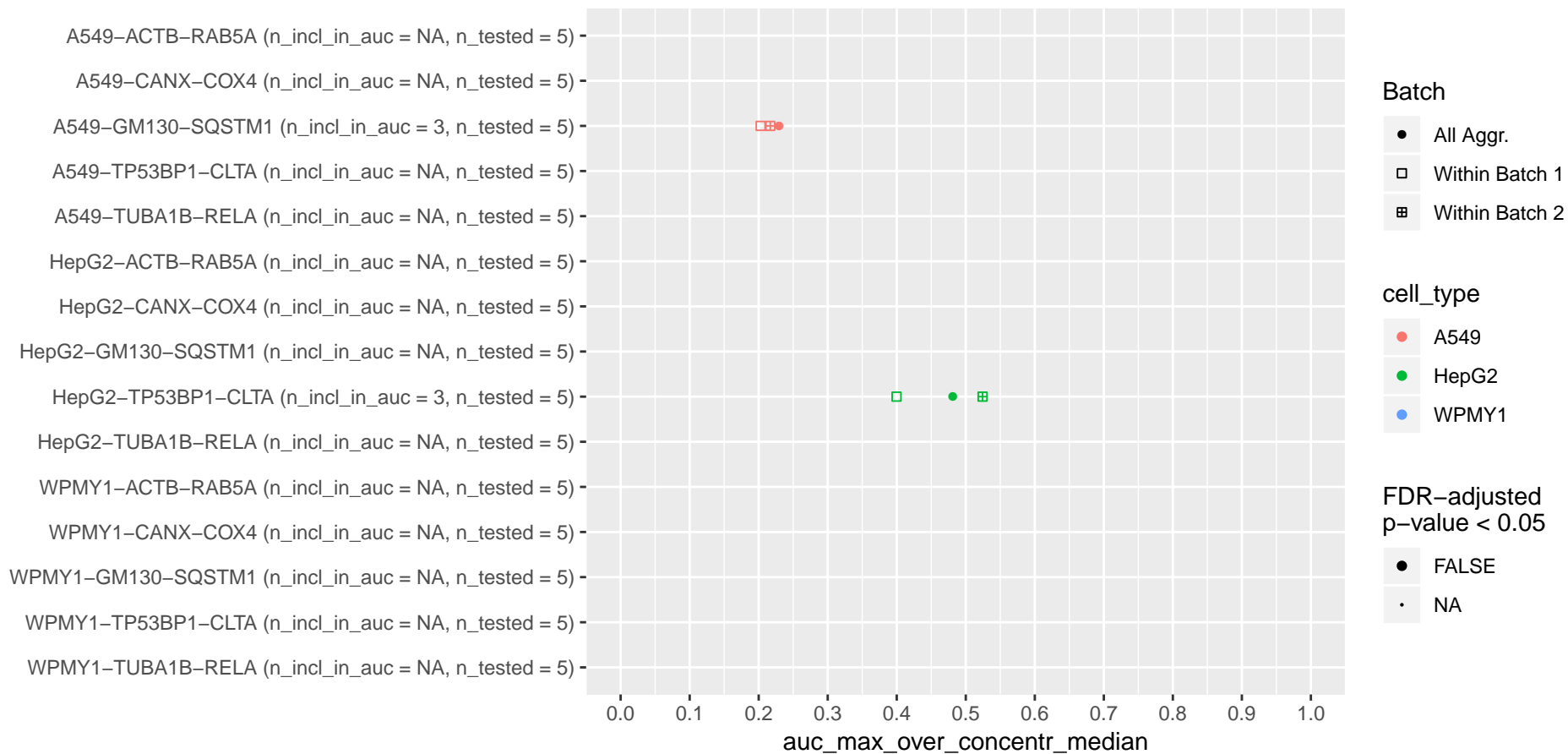


# Calmodulin^antagonist

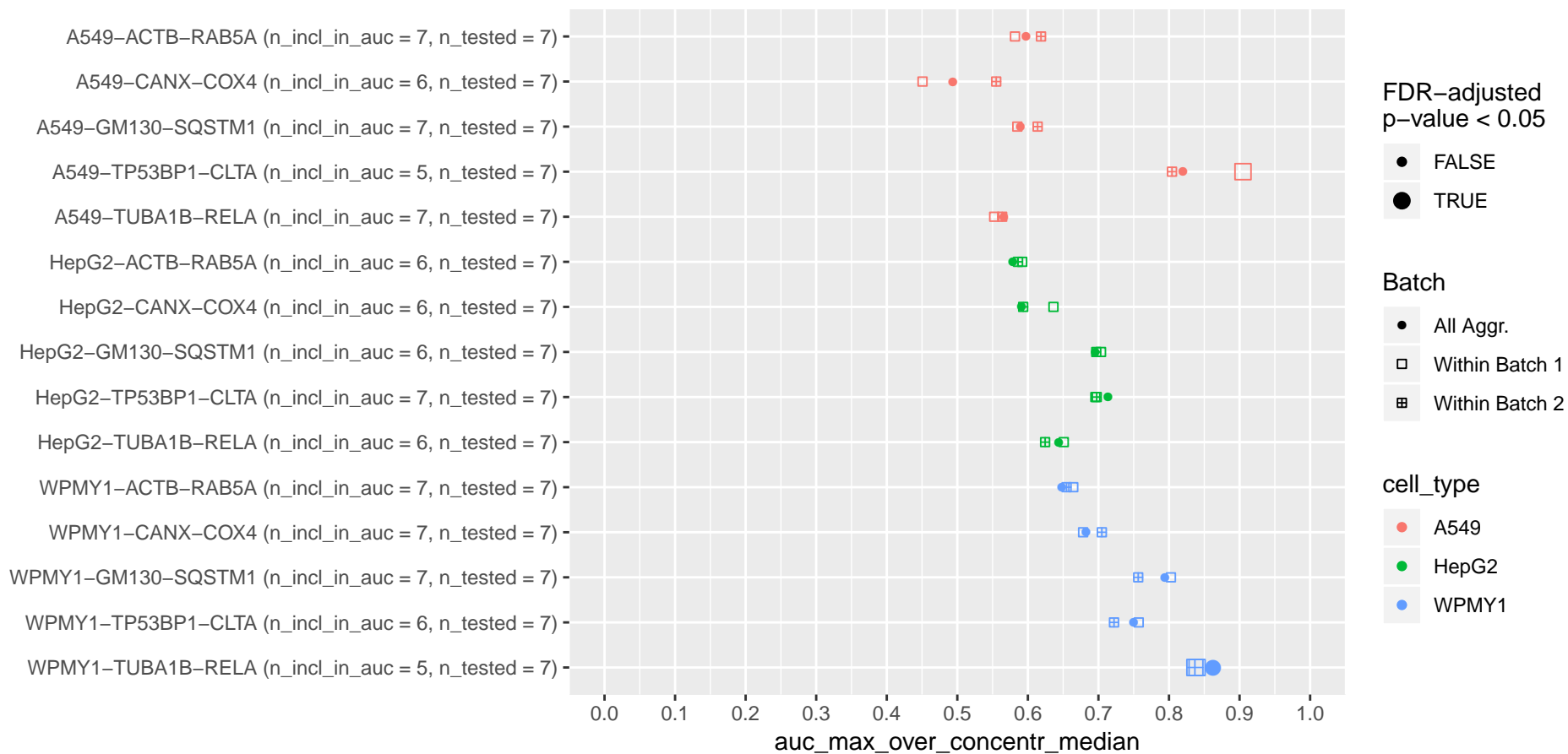




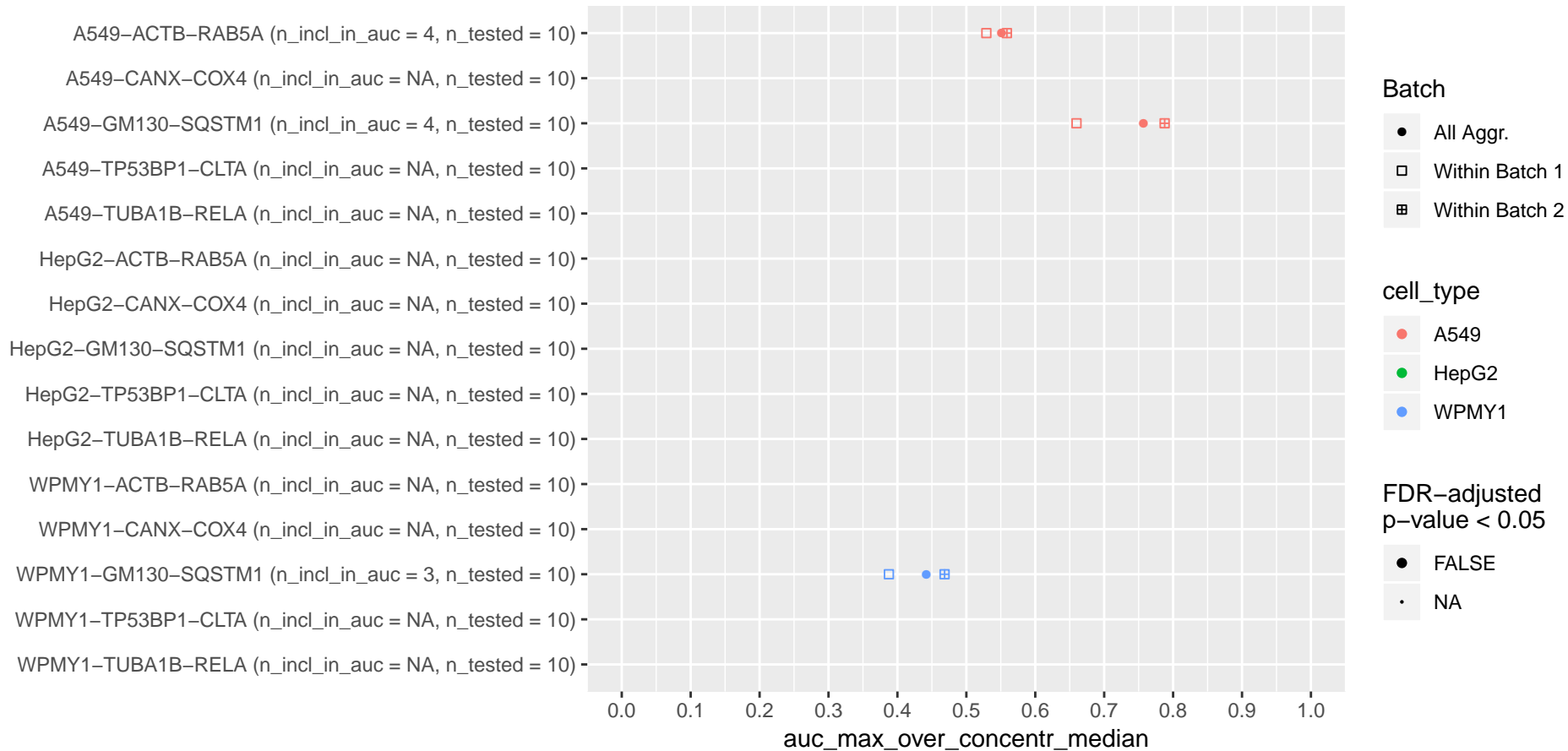
# Casein kinase 1<sup>inhibitor</sup>



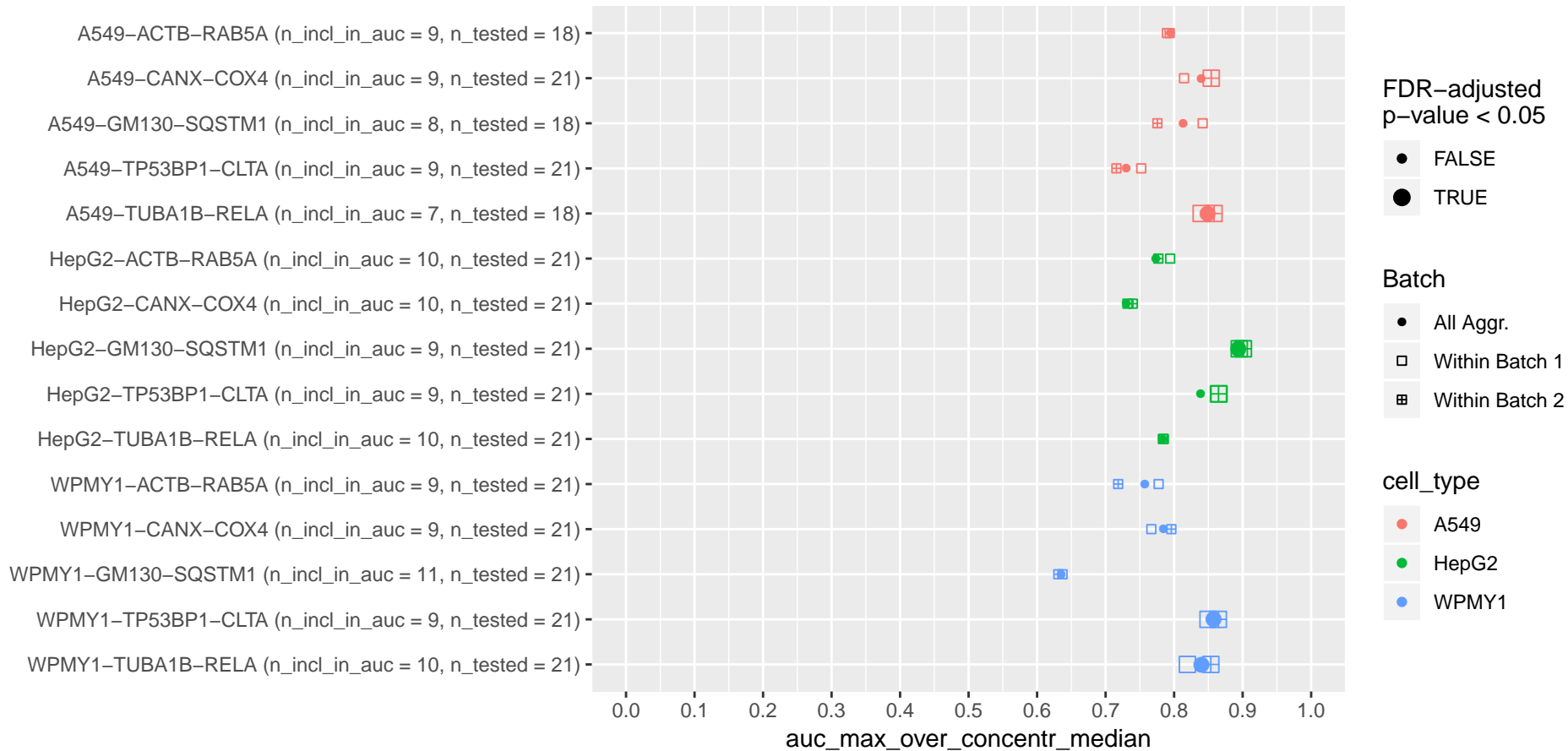
# Checkpoint kinase<sup>in</sup>inhibitor



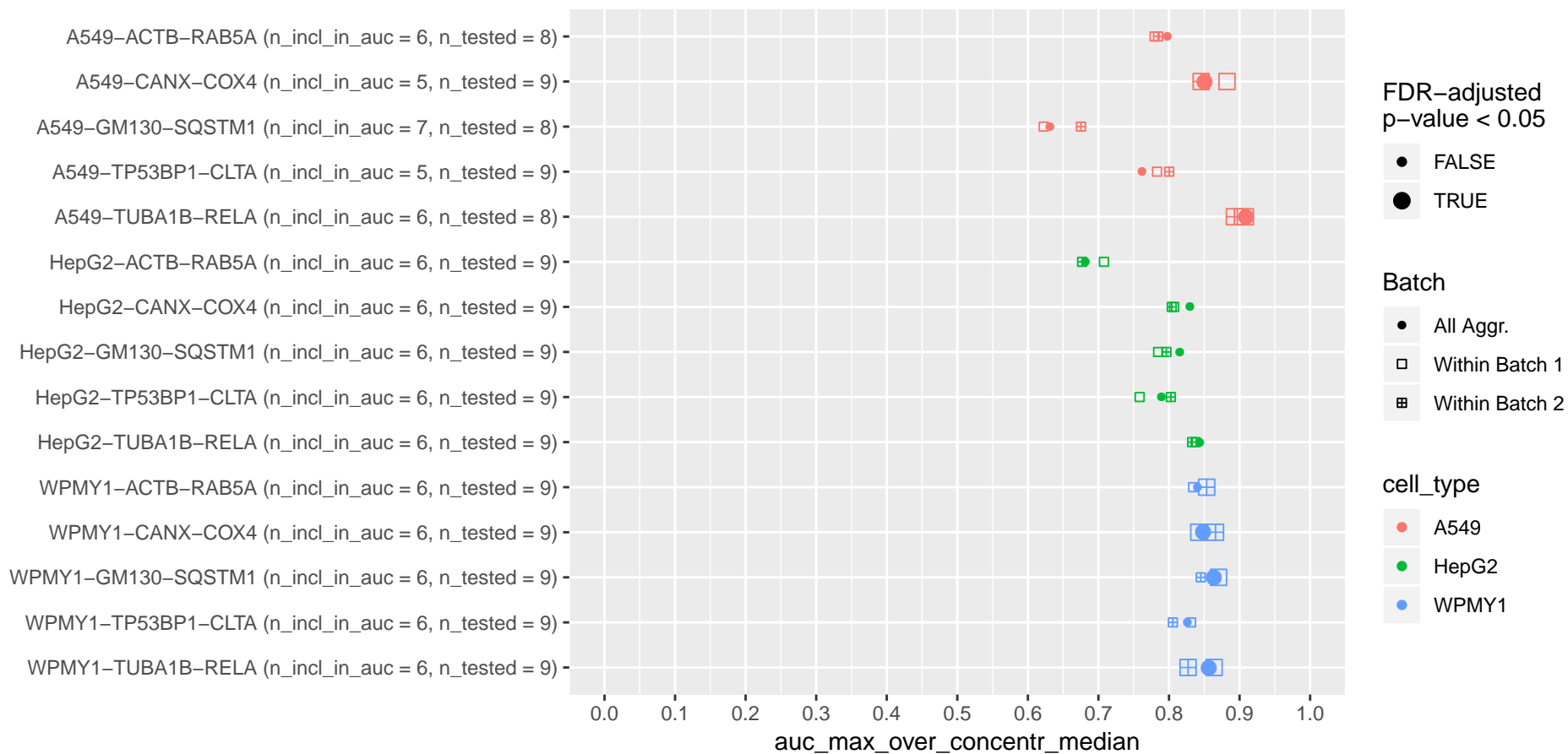
# Cytochrome P450<sup>1</sup>inhibitor



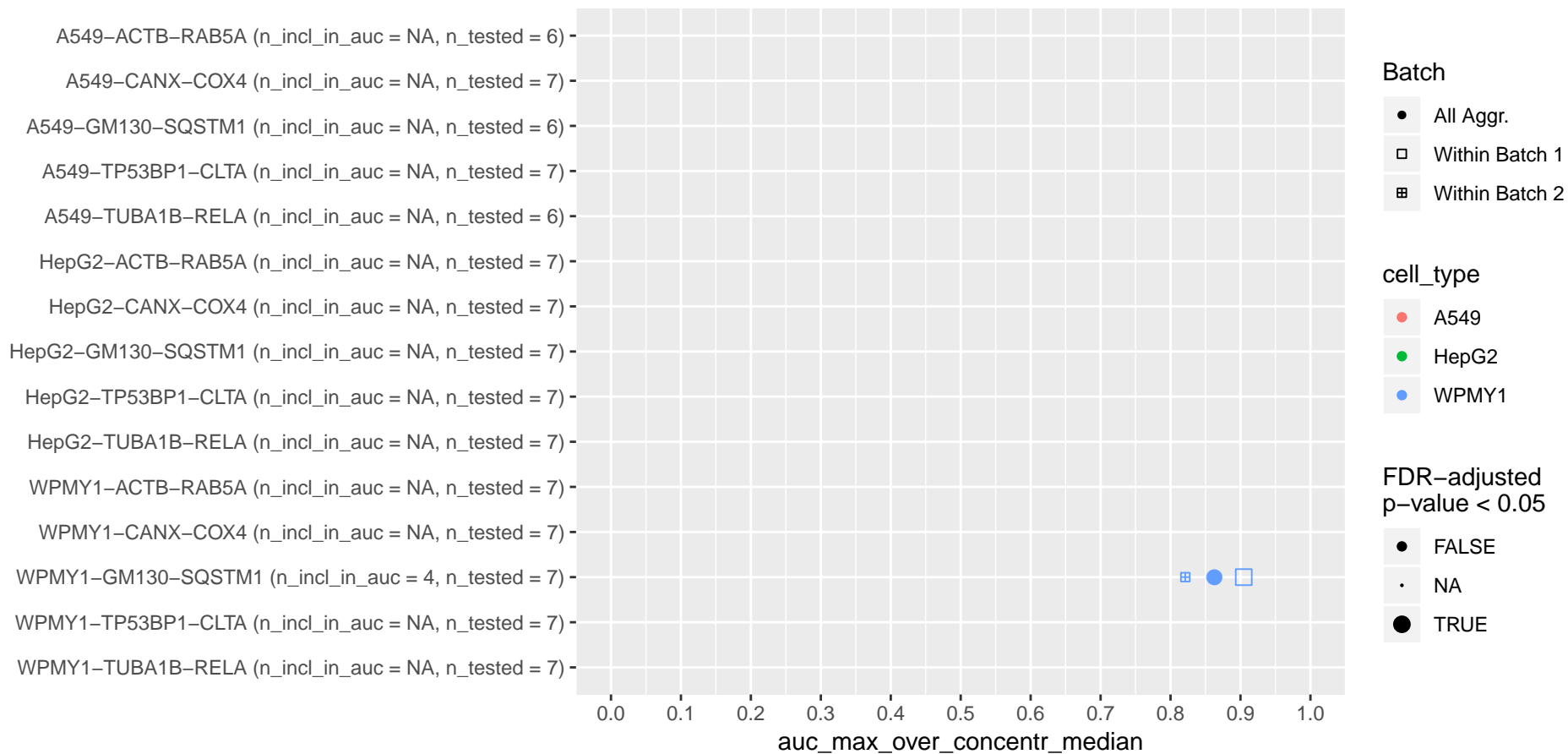
# DNA synthesis<sup>inhibitor</sup>



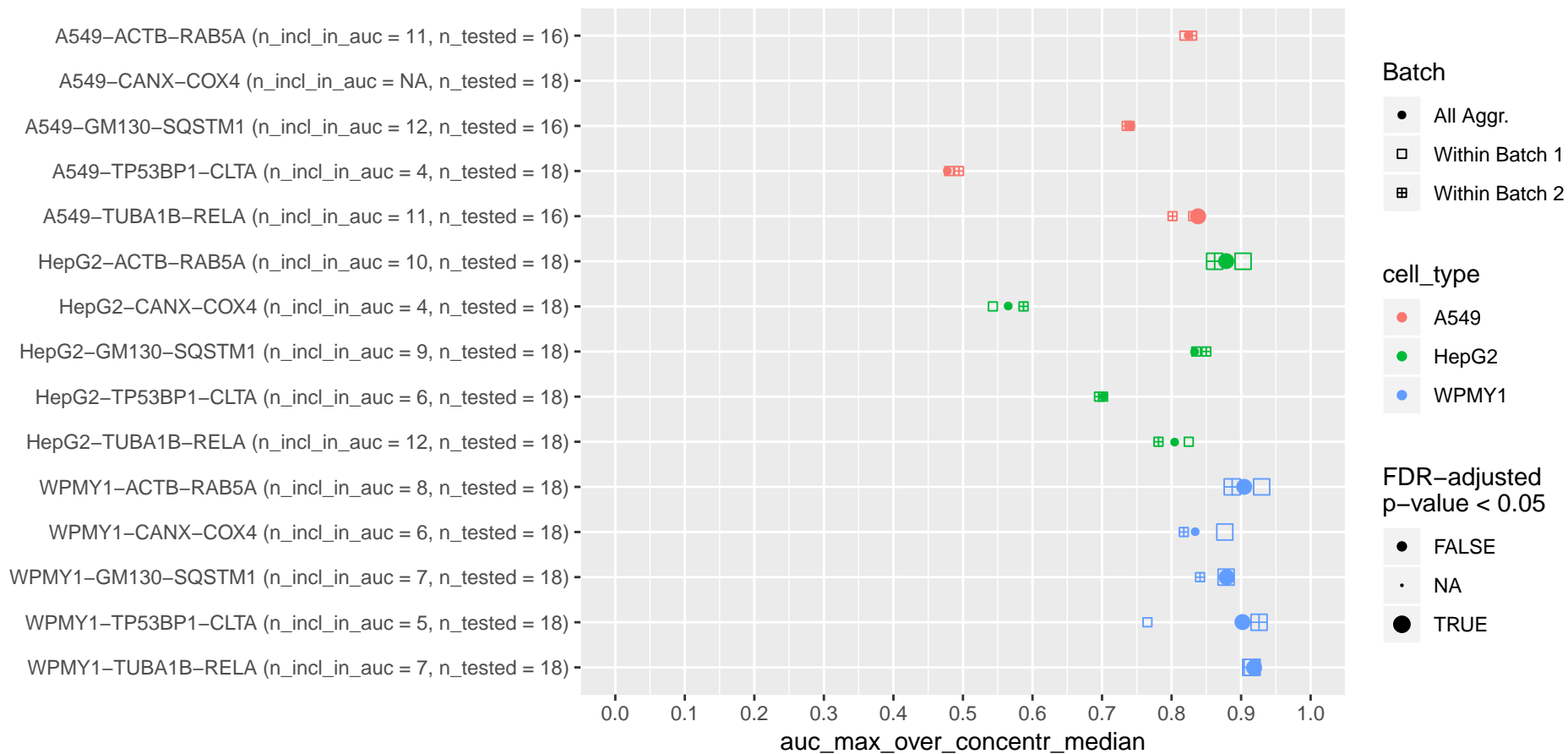
# DNA-PK<sup>inhibitor</sup>



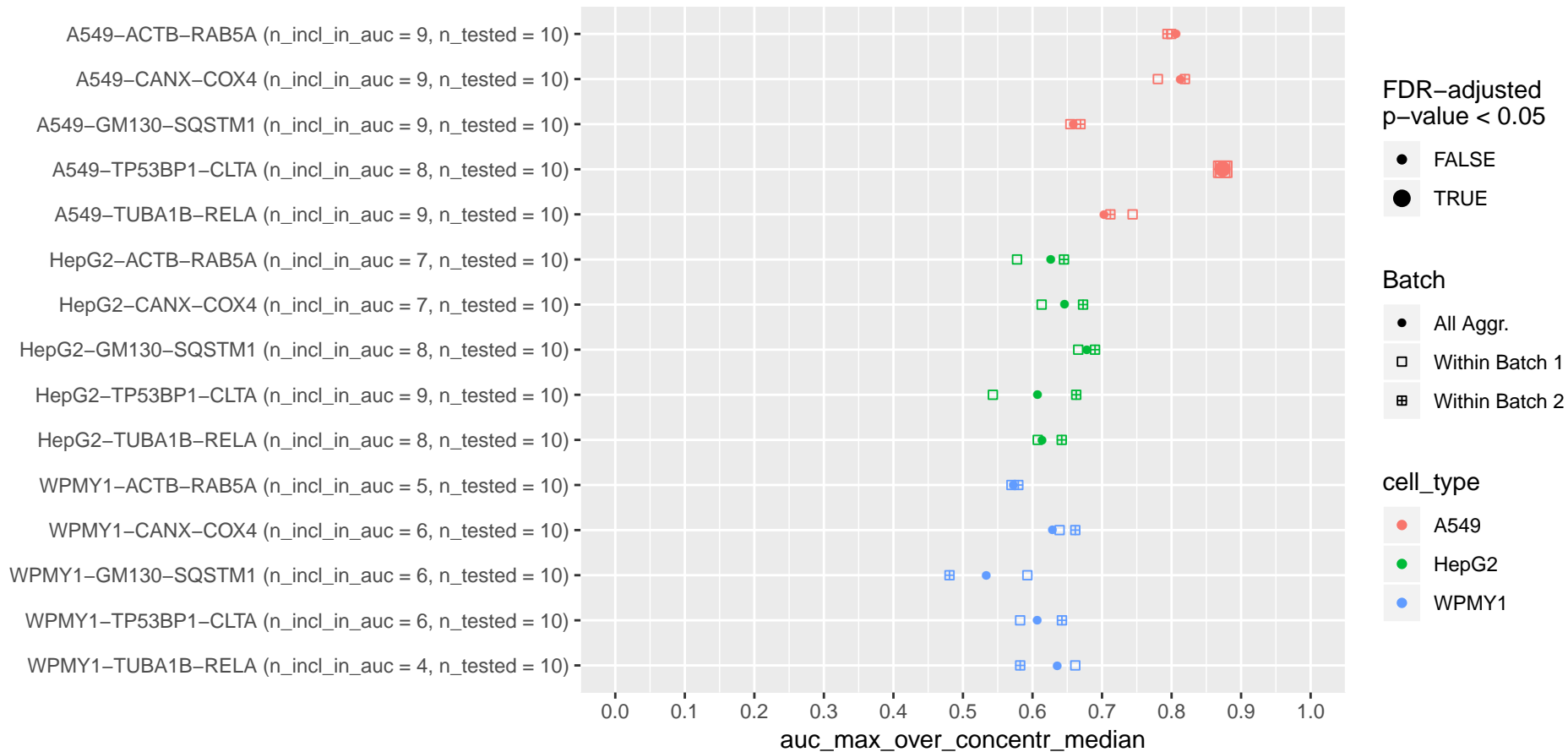
# Dopamine receptor^agonist



# Dopamine receptor^antagonist

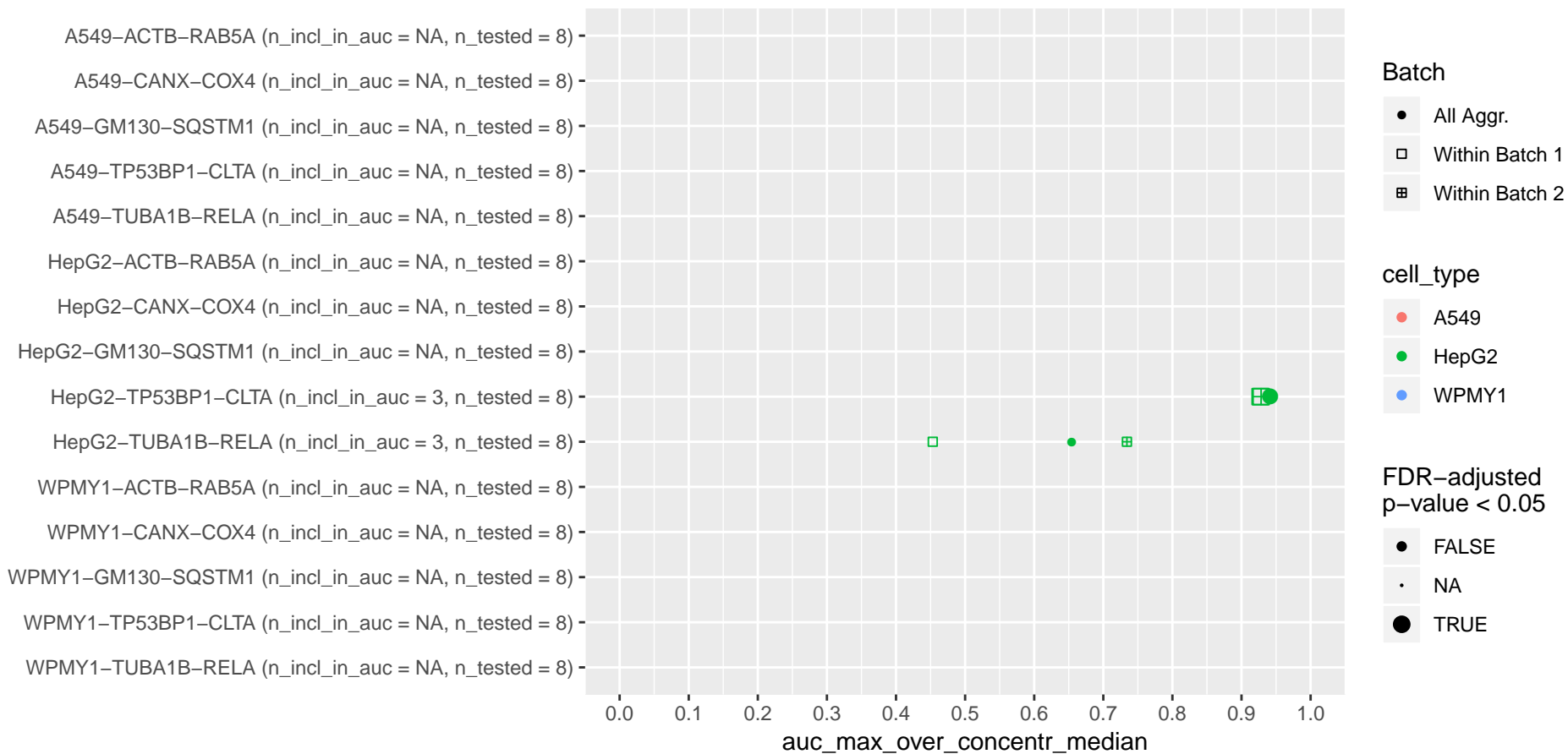


# ErbB family^inhibitor

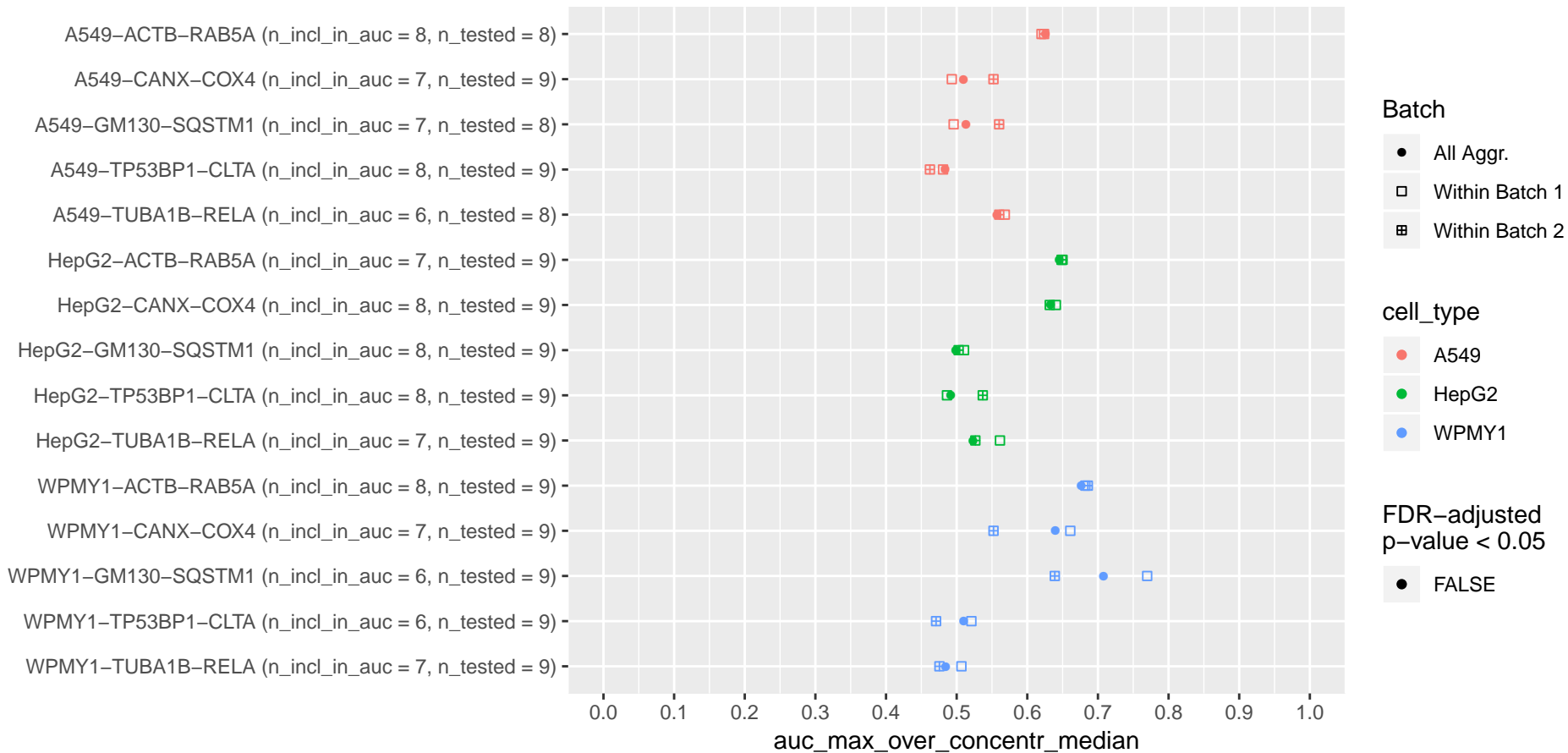




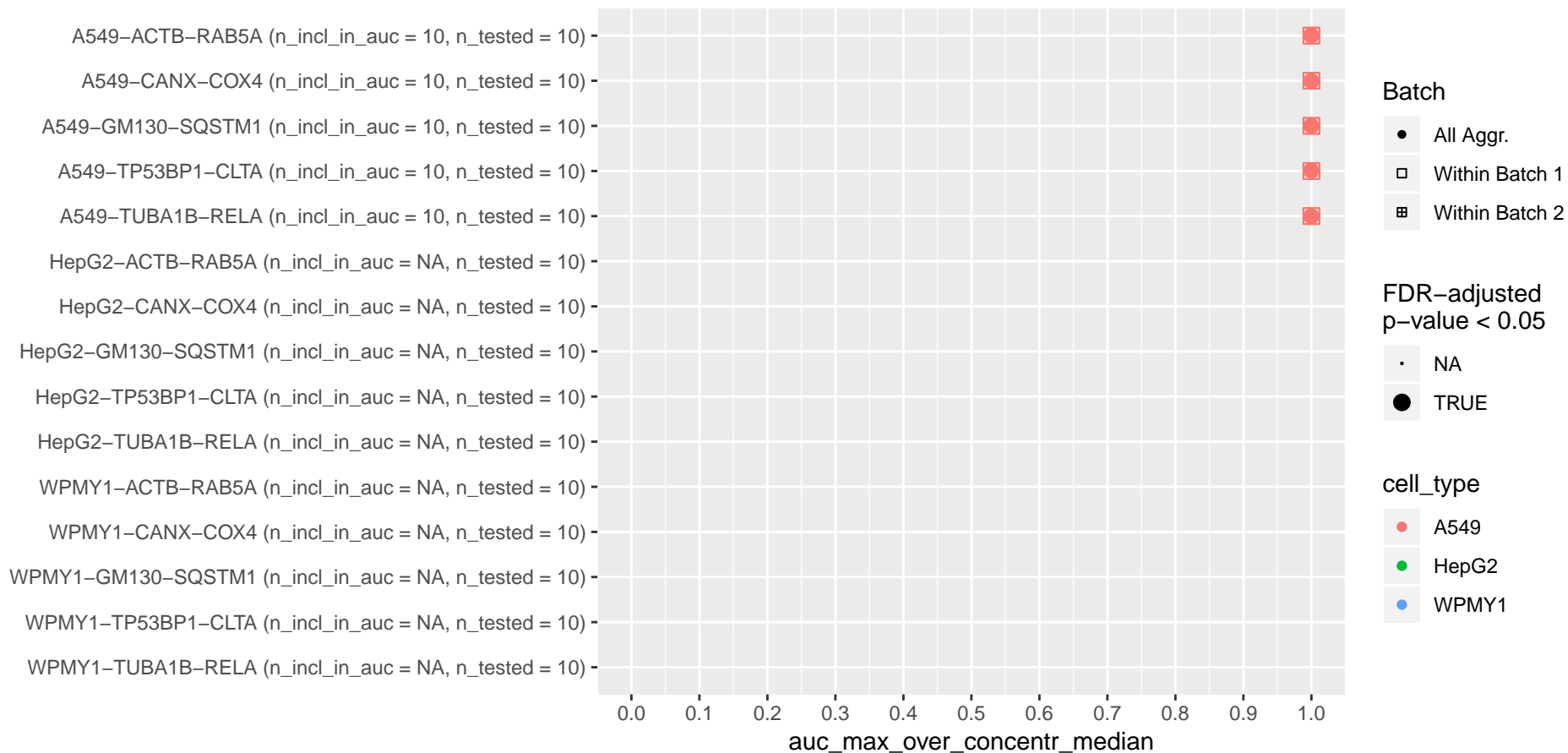
# FAAH<sup>inhibitor</sup>



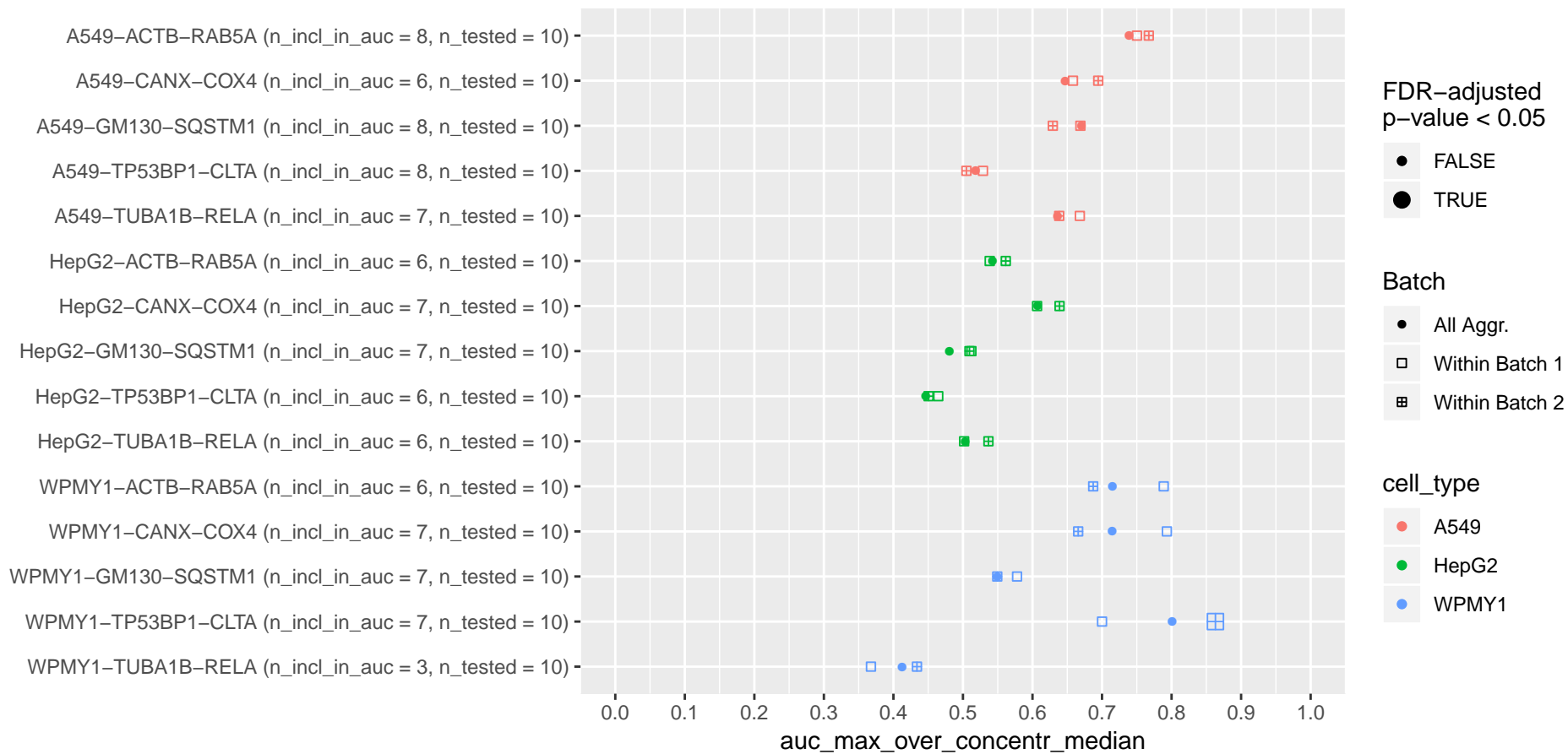
# FGFR family^inhibitor



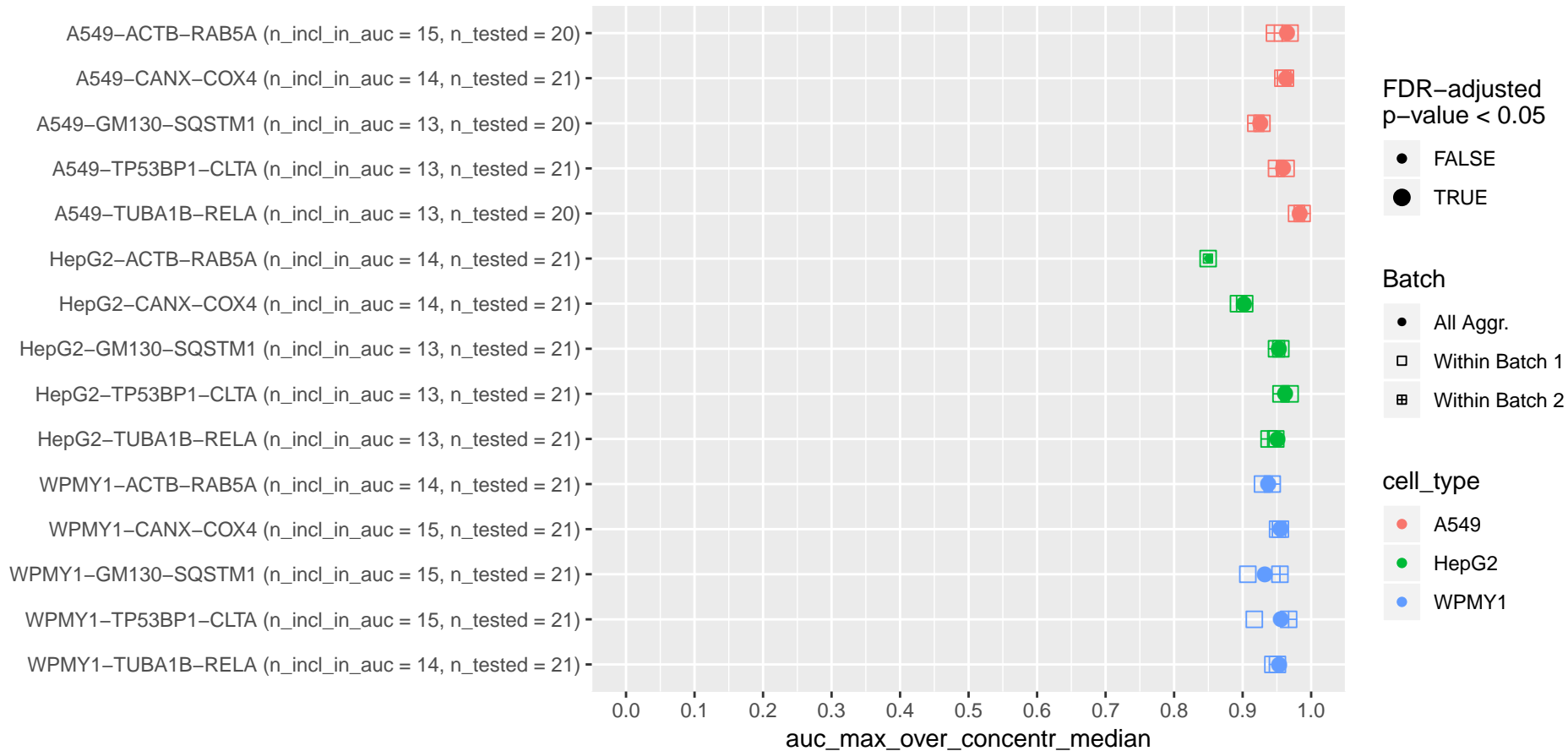
# Glucocorticoid receptor^agonist



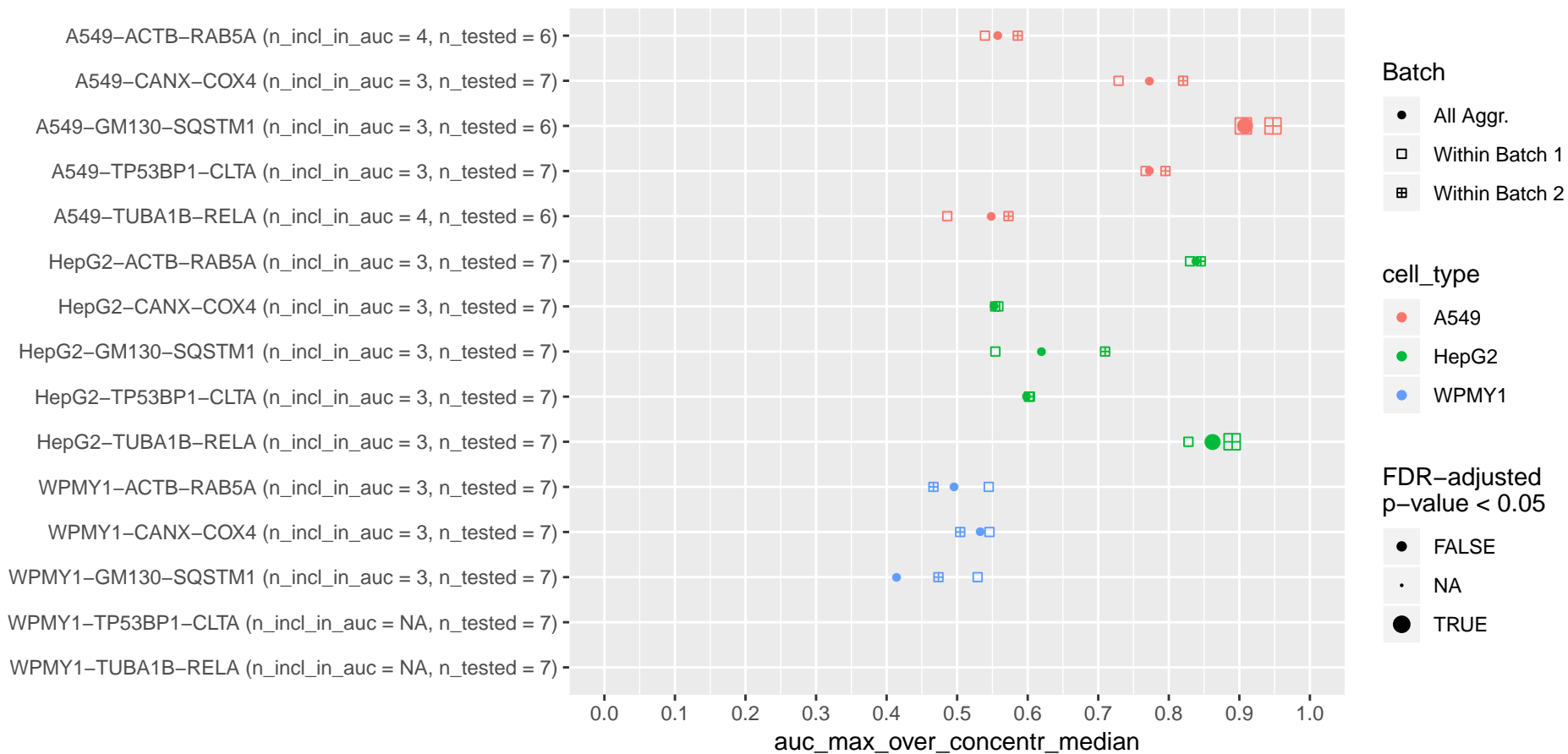
# Glycogen synthase kinase 3<sup>in</sup>hibitor



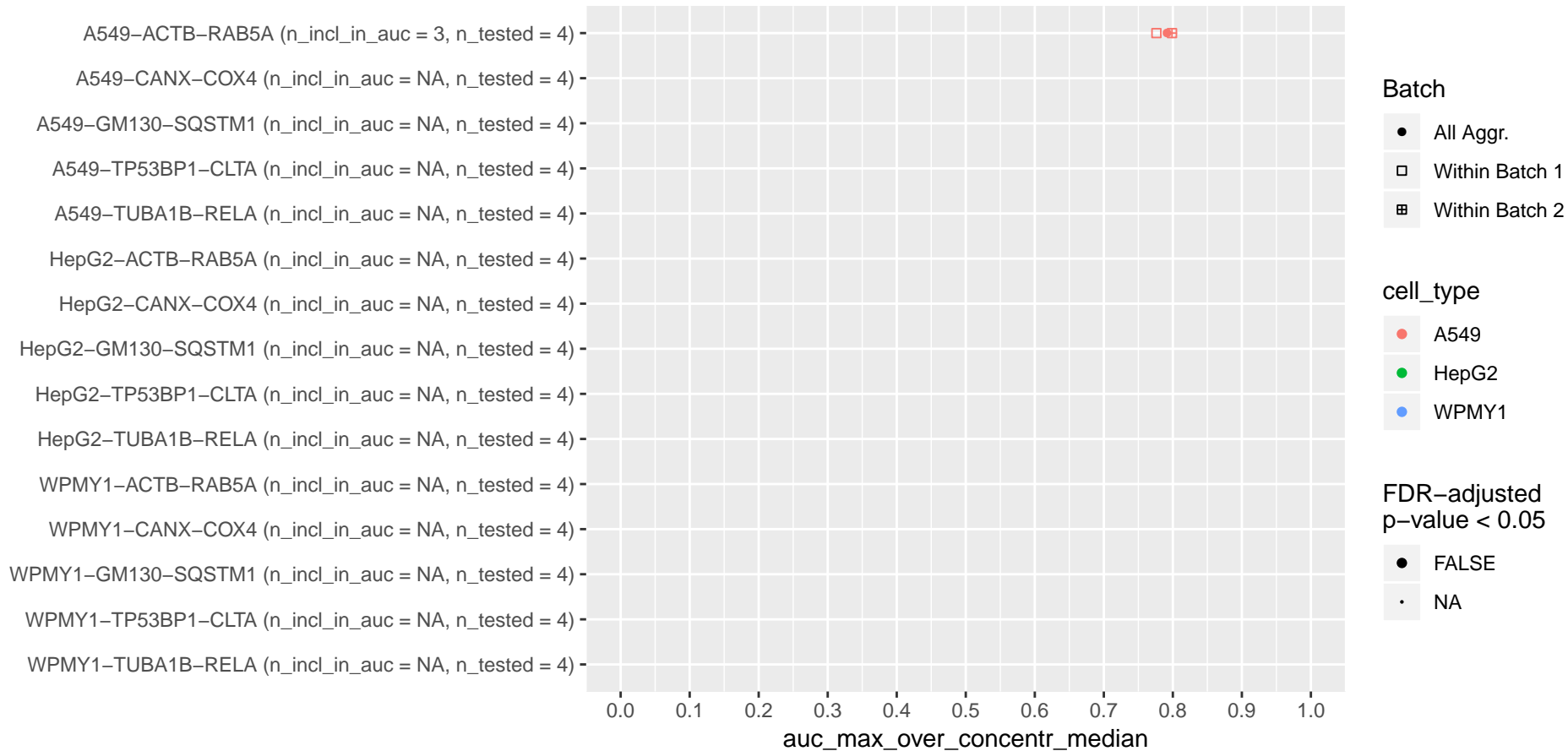
# HDAC<sup>+</sup>inhibitor



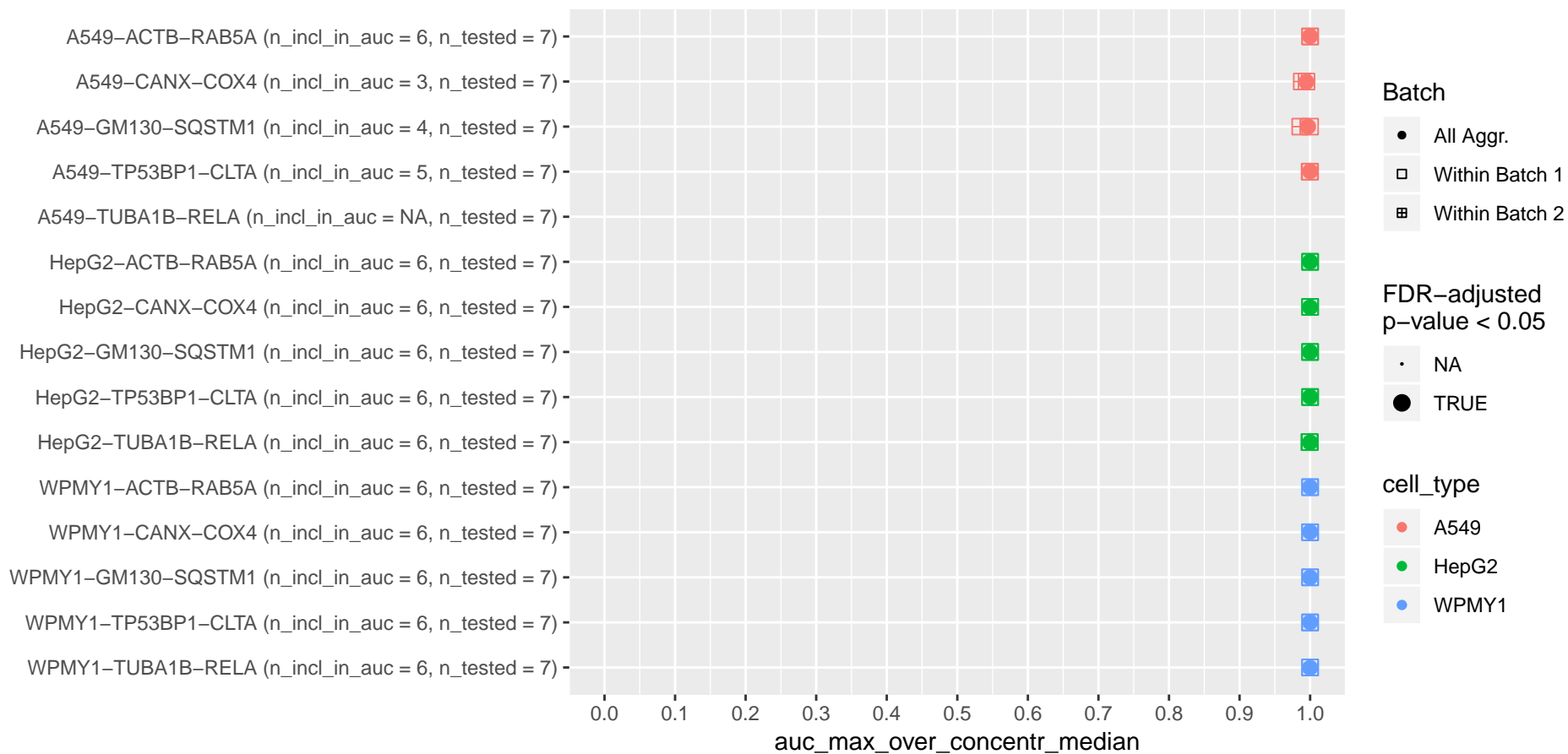
# HGF receptor family^inhibitor



# HIV protease<sup>in</sup>hibitor

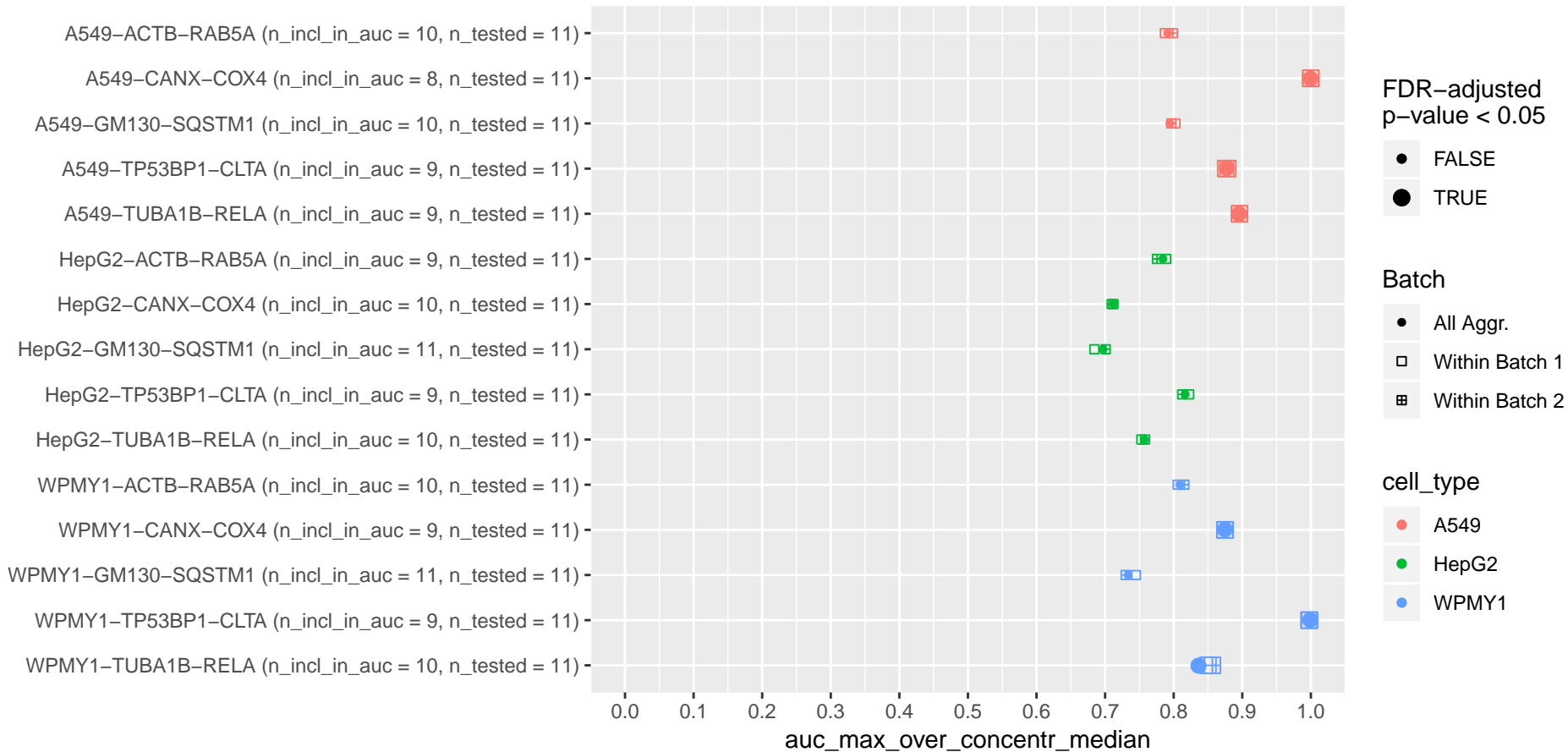


# HMG-CoA reductase<sup>^</sup>inhibitor

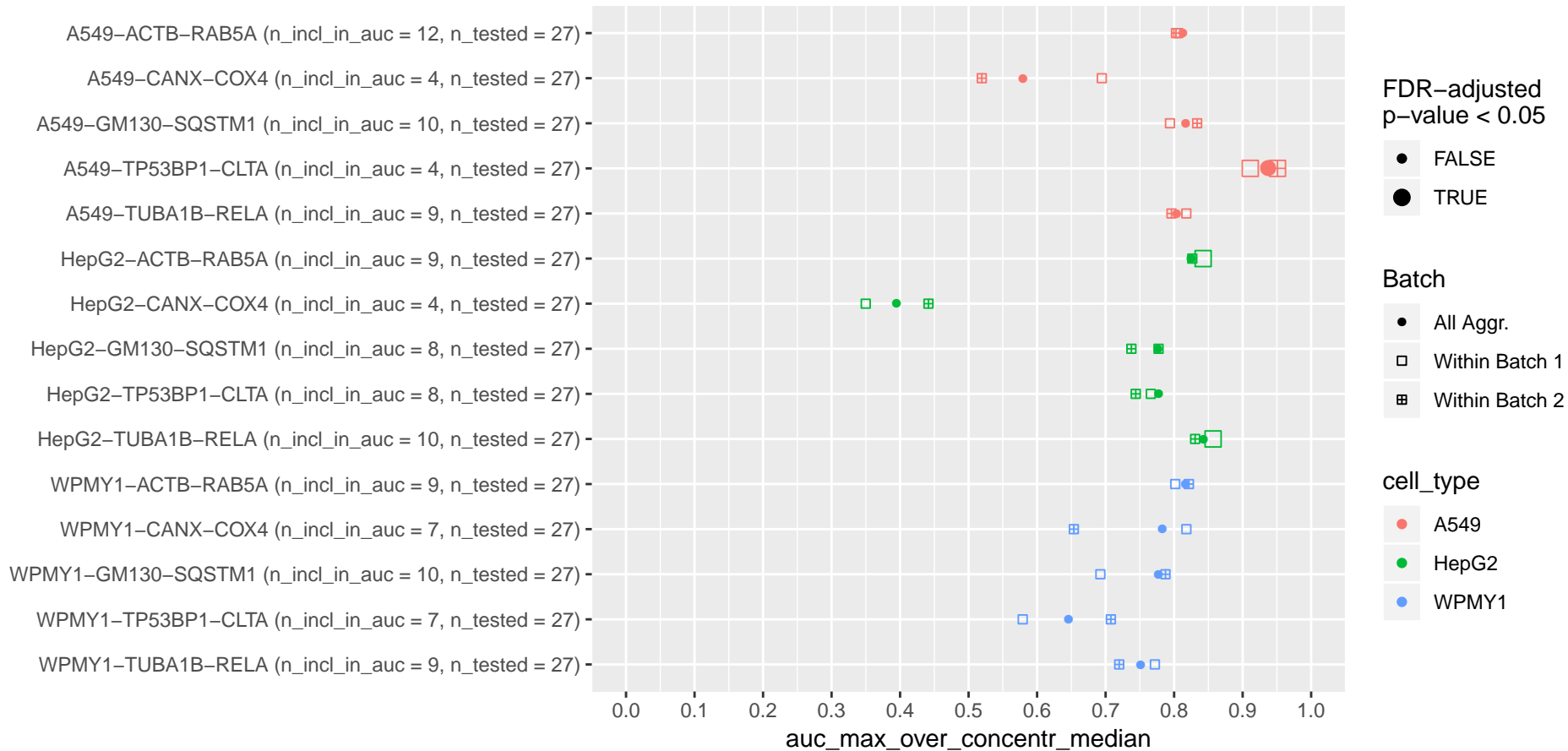




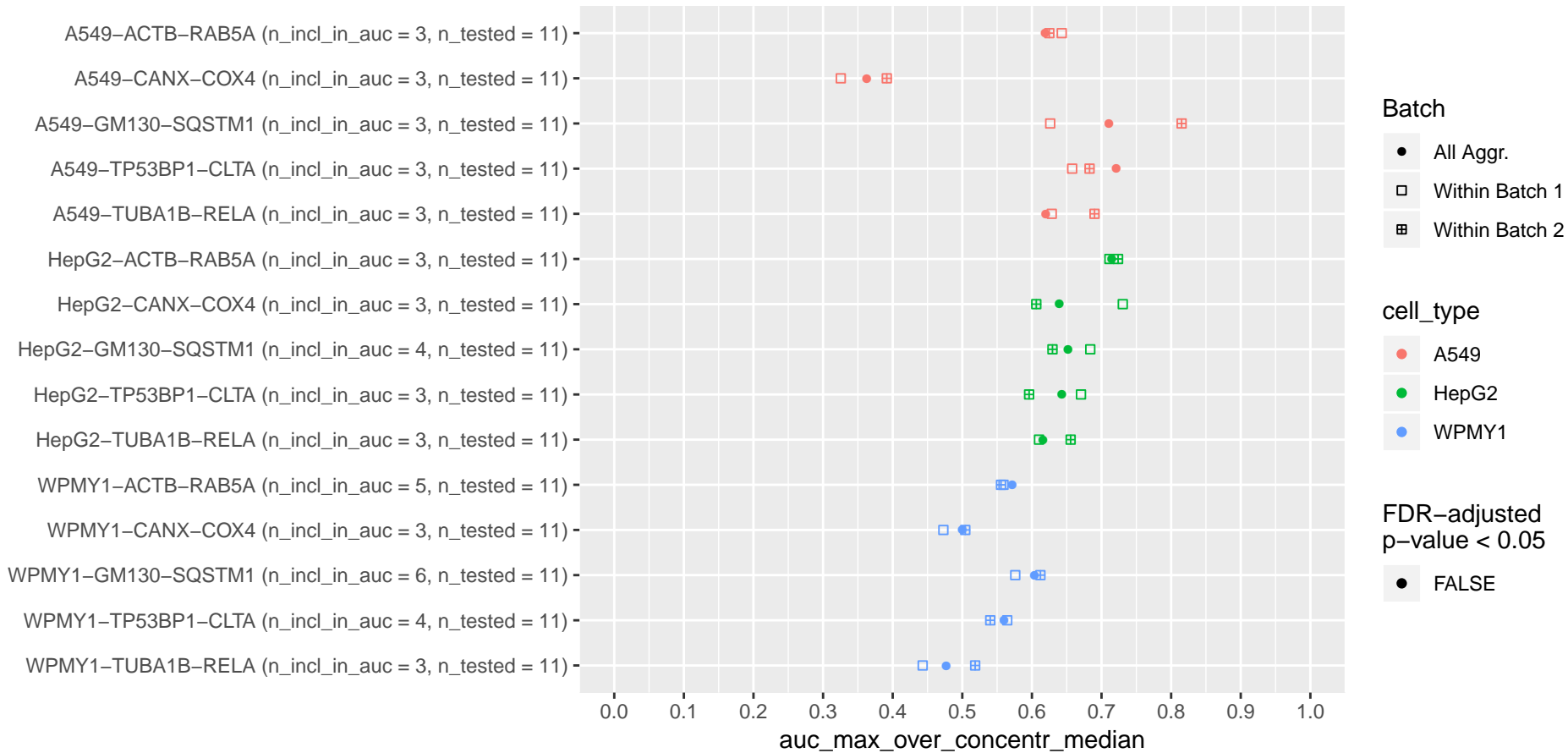
# Heat shock protein<sup>inhibitor</sup>

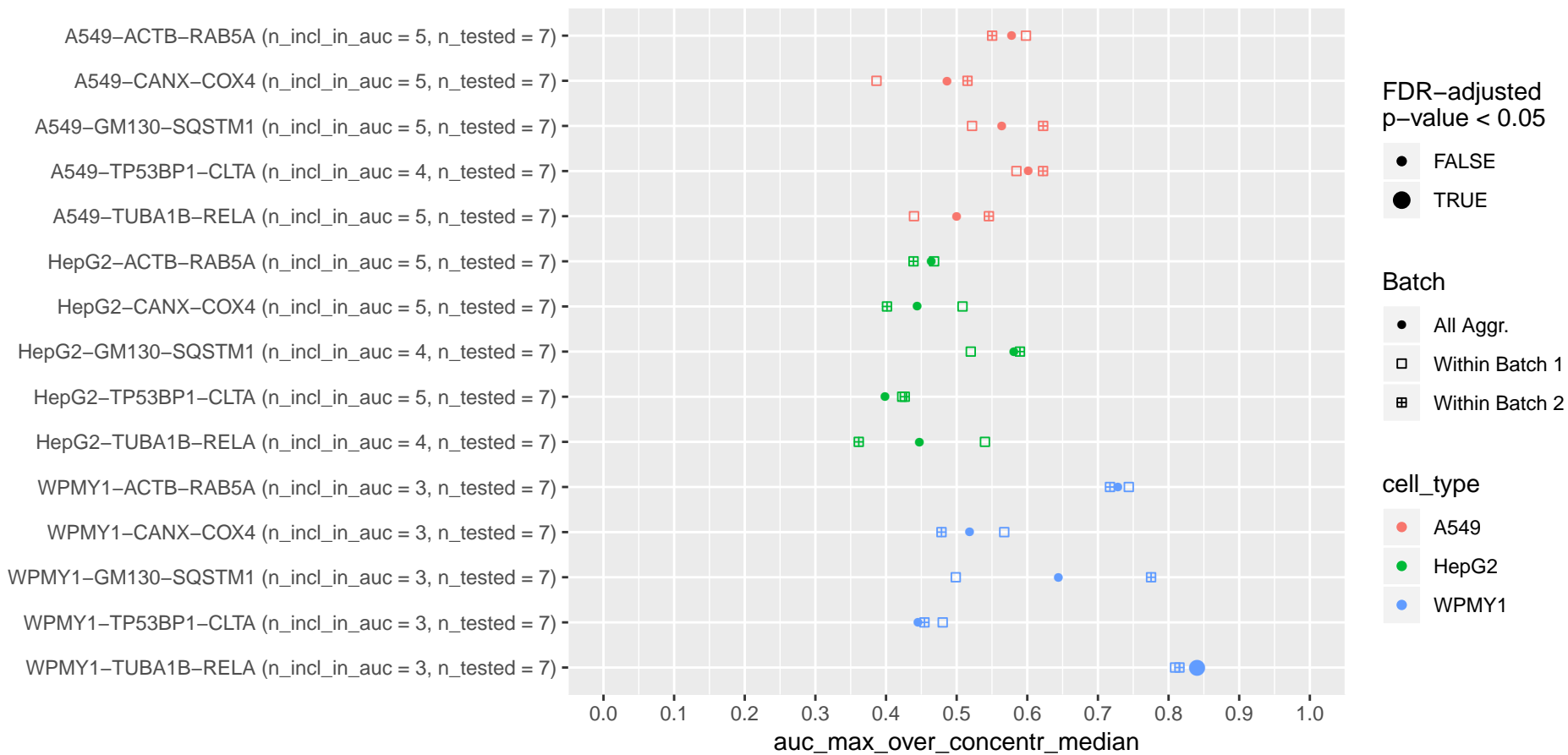


# Histamine receptor^antagonist

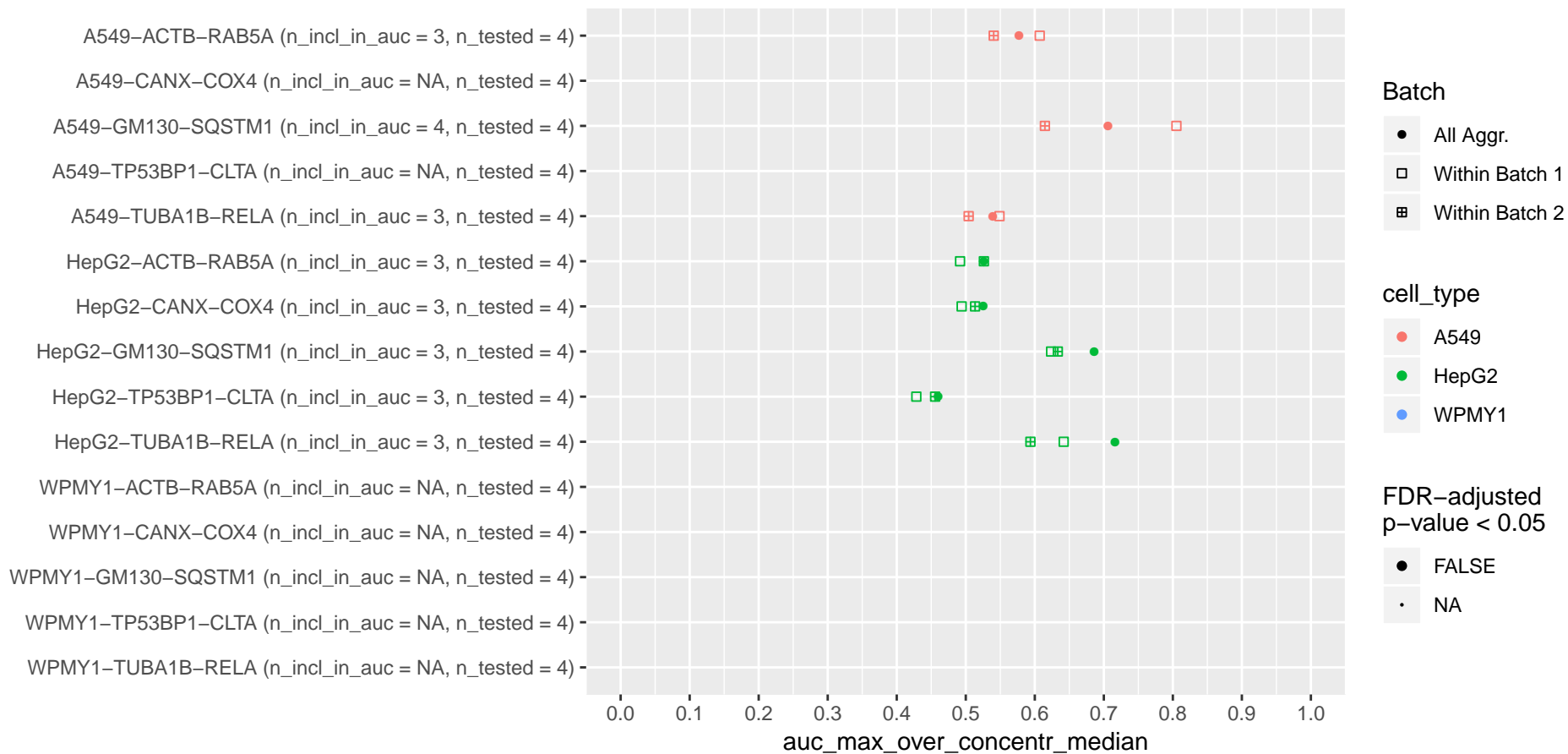


# Histone demethylase<sup>inhibitor</sup>

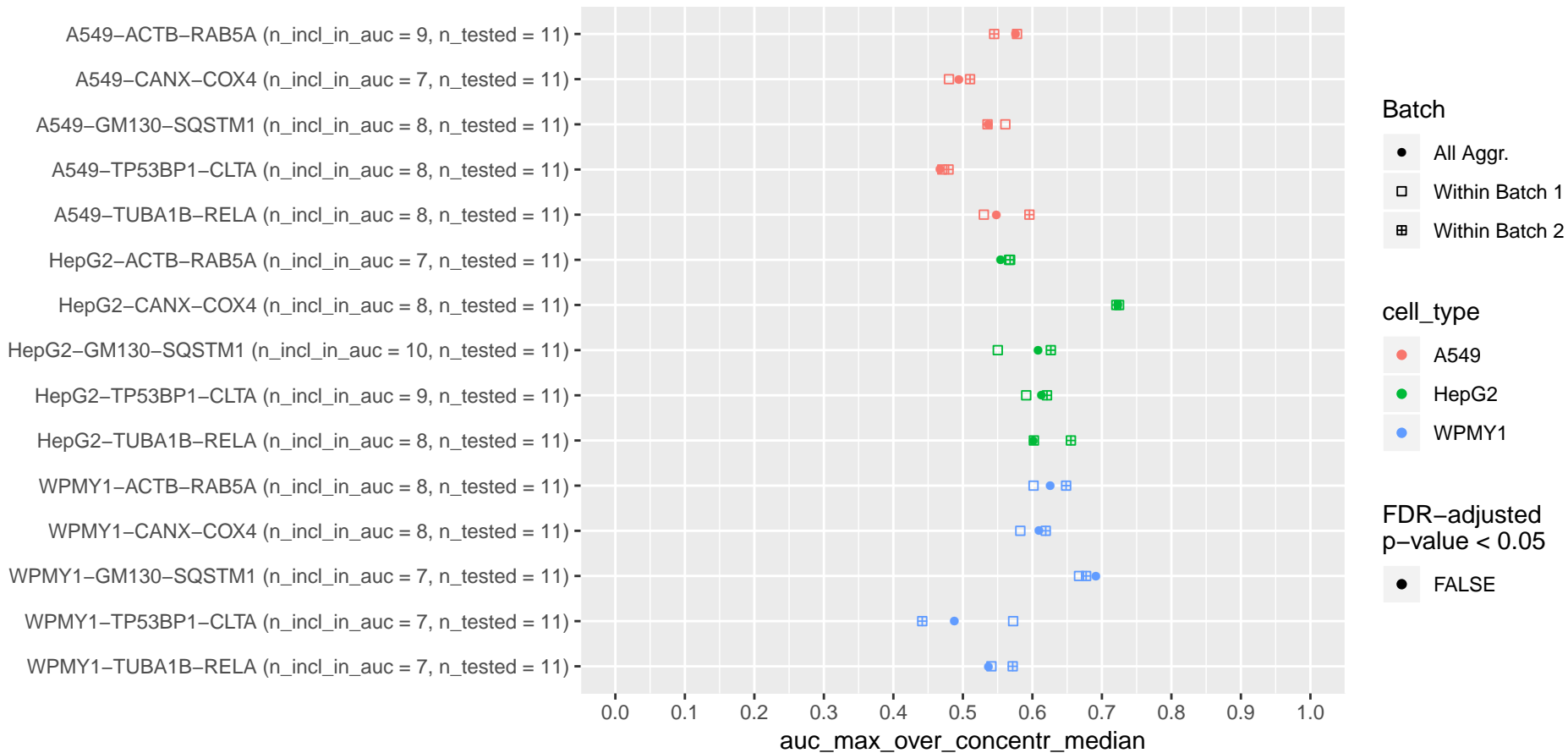


I $\kappa$ B kinase<sup>inhibitor</sup>

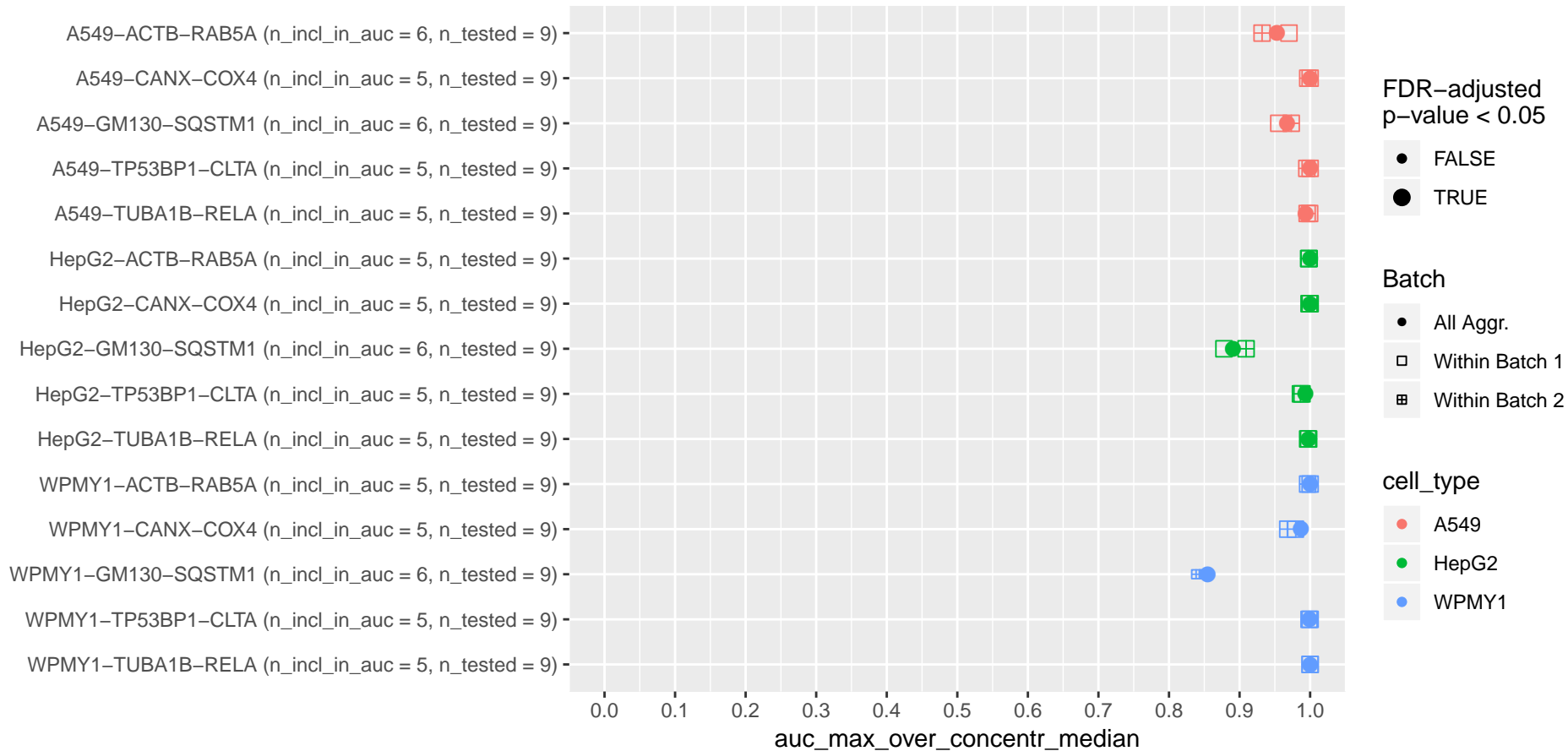
# Insulin receptor family^inhibitor



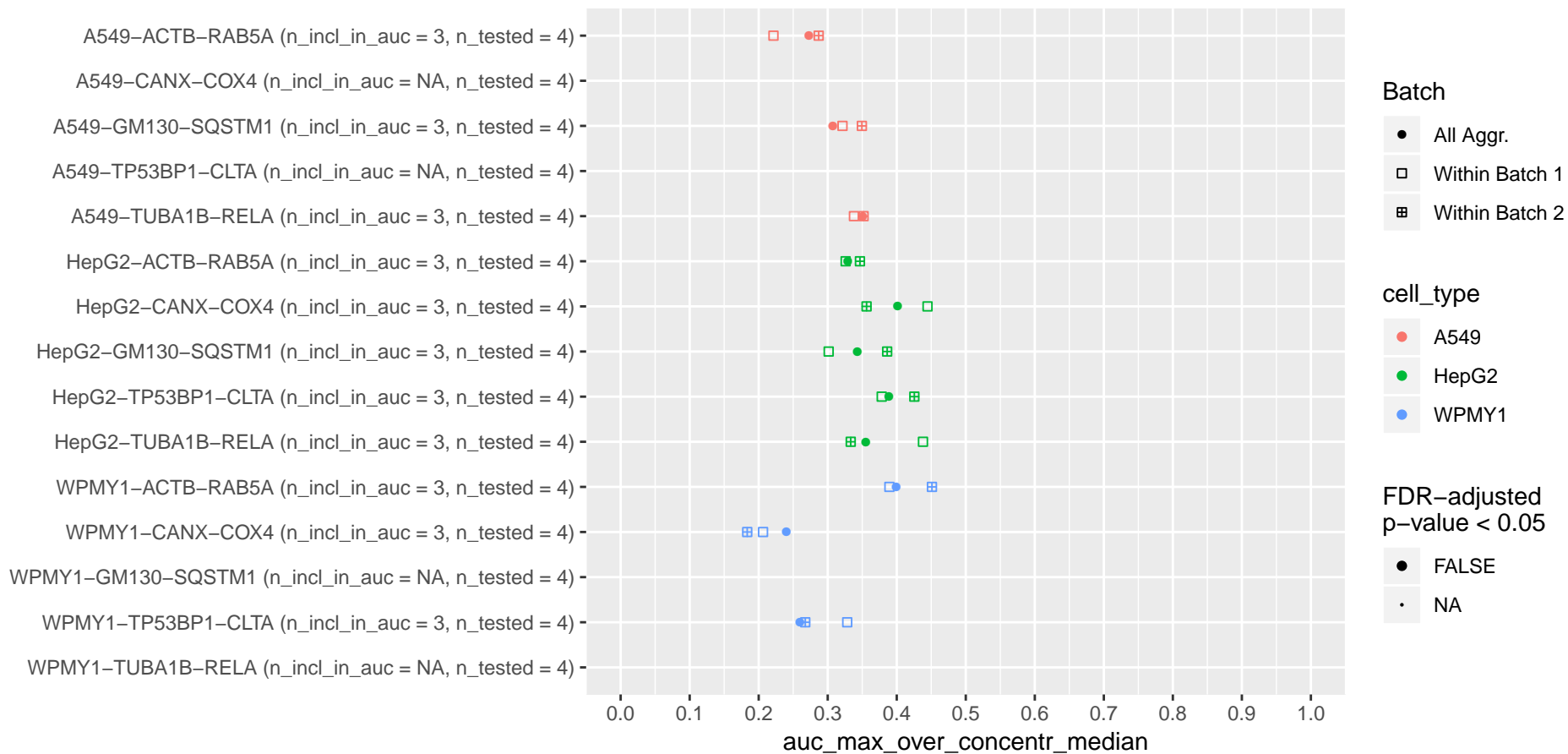
# Janus kinase family<sup>^</sup>inhibitor



# Kinesin<sup>inhibitor</sup>

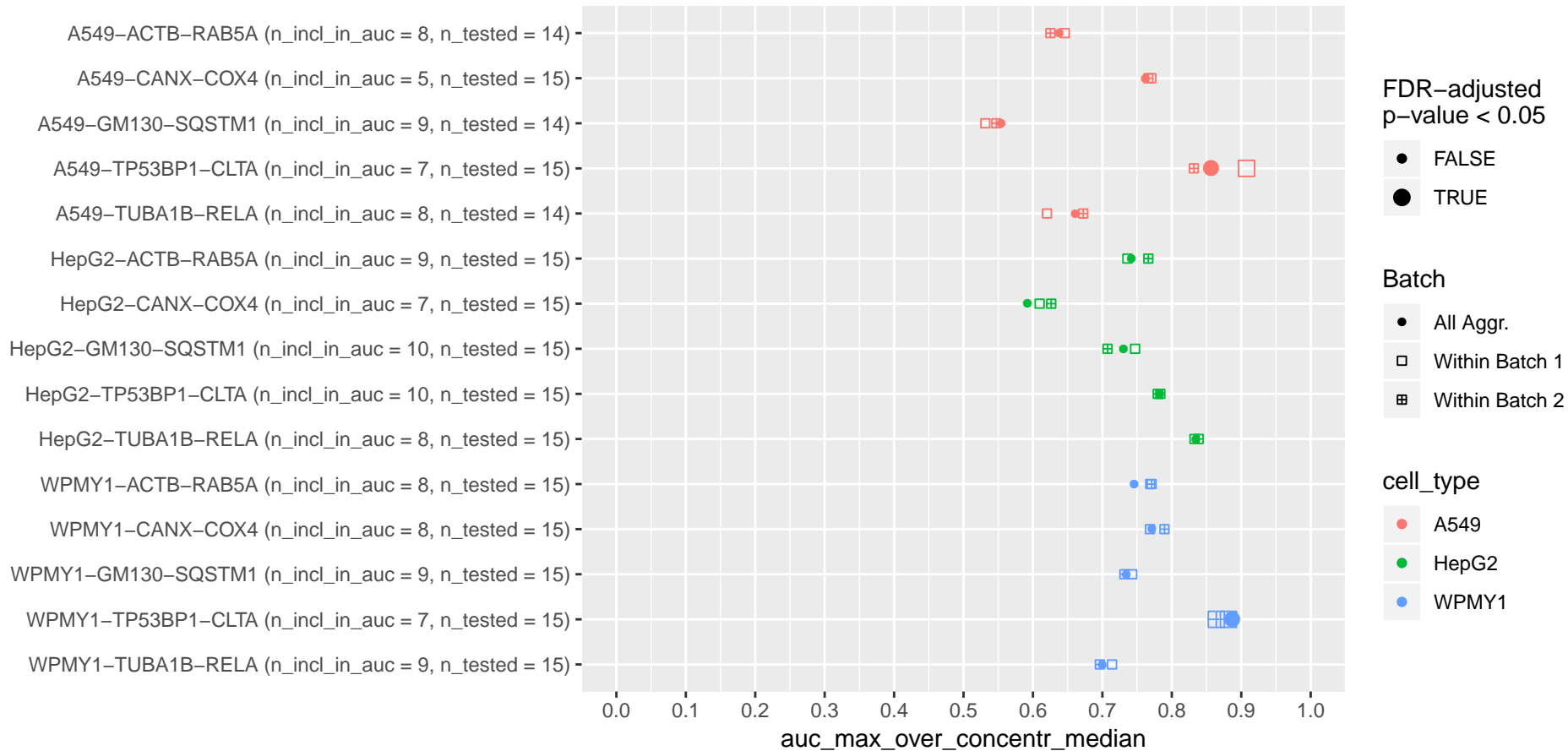


# LRRK2<sup>inhibitor</sup>

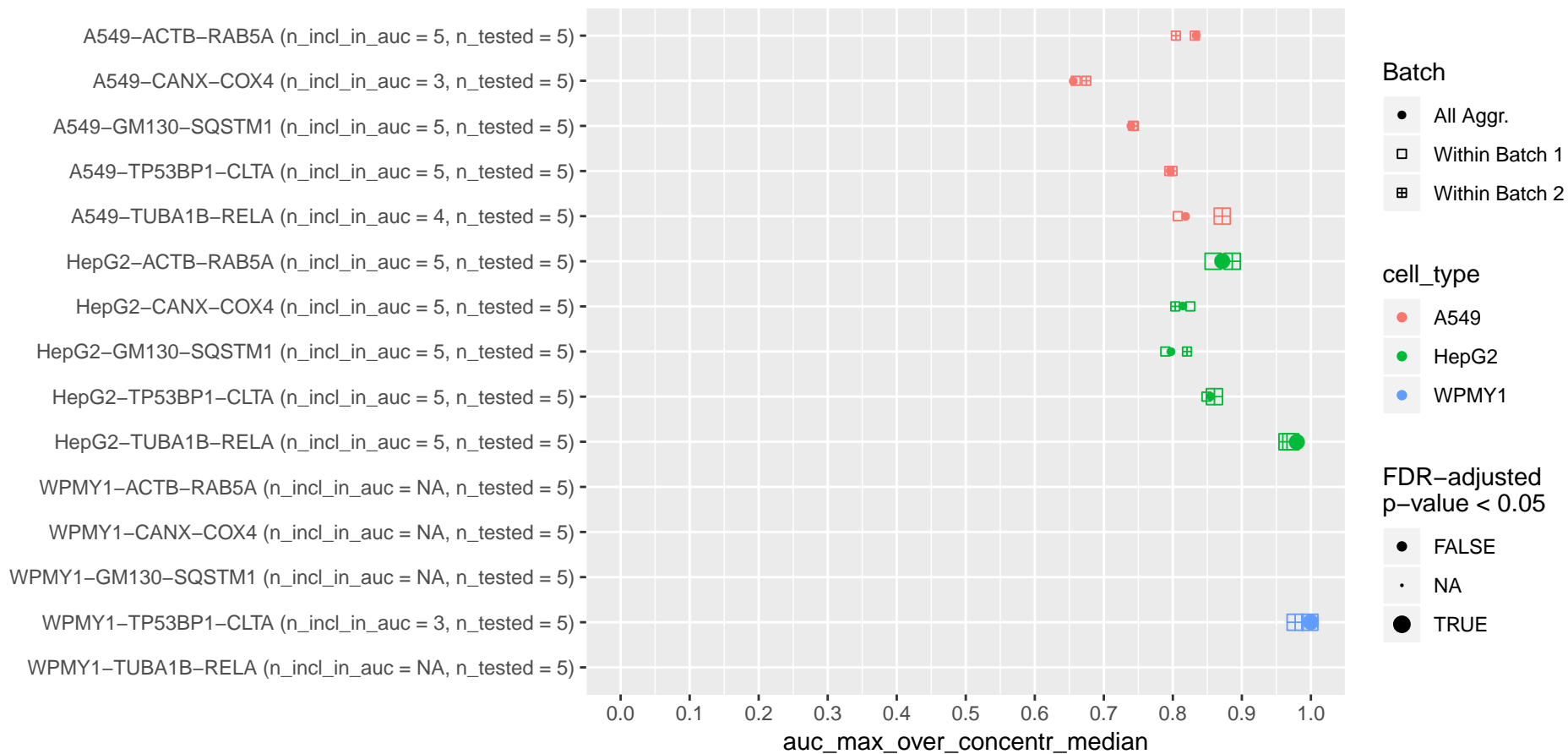




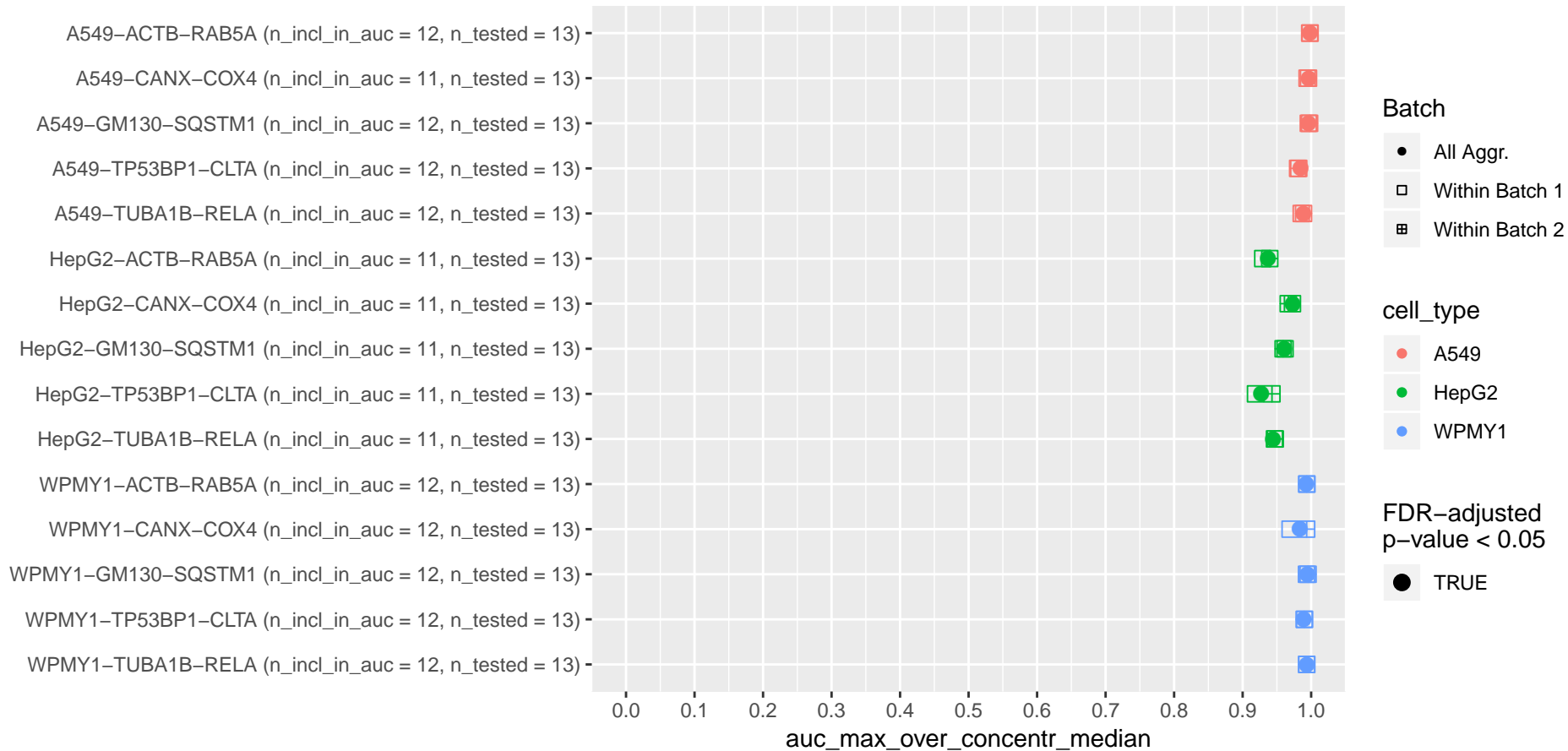
# Lysine methyltransferase<sup>inhibitor</sup>



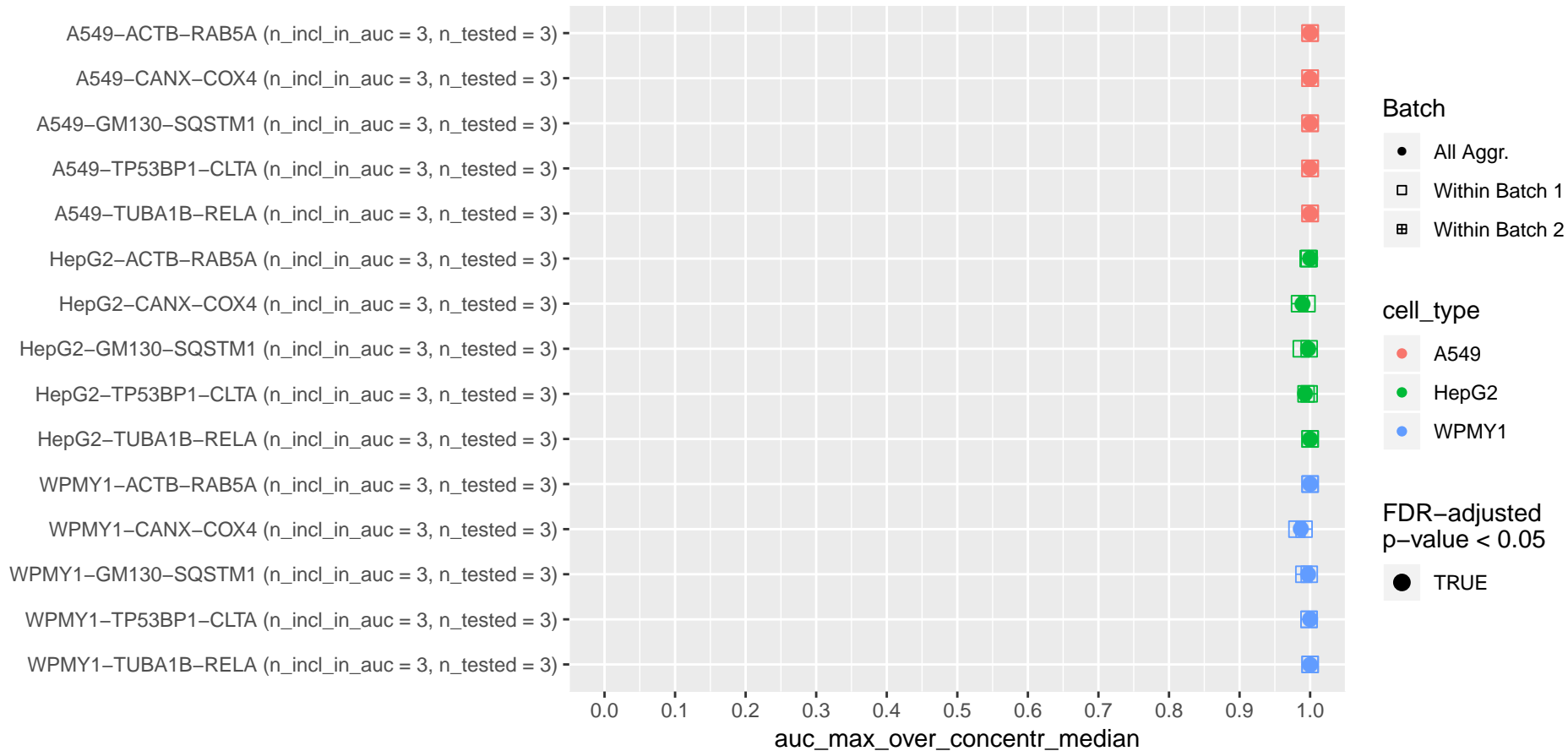
# MEK<sup>inhibitor</sup>



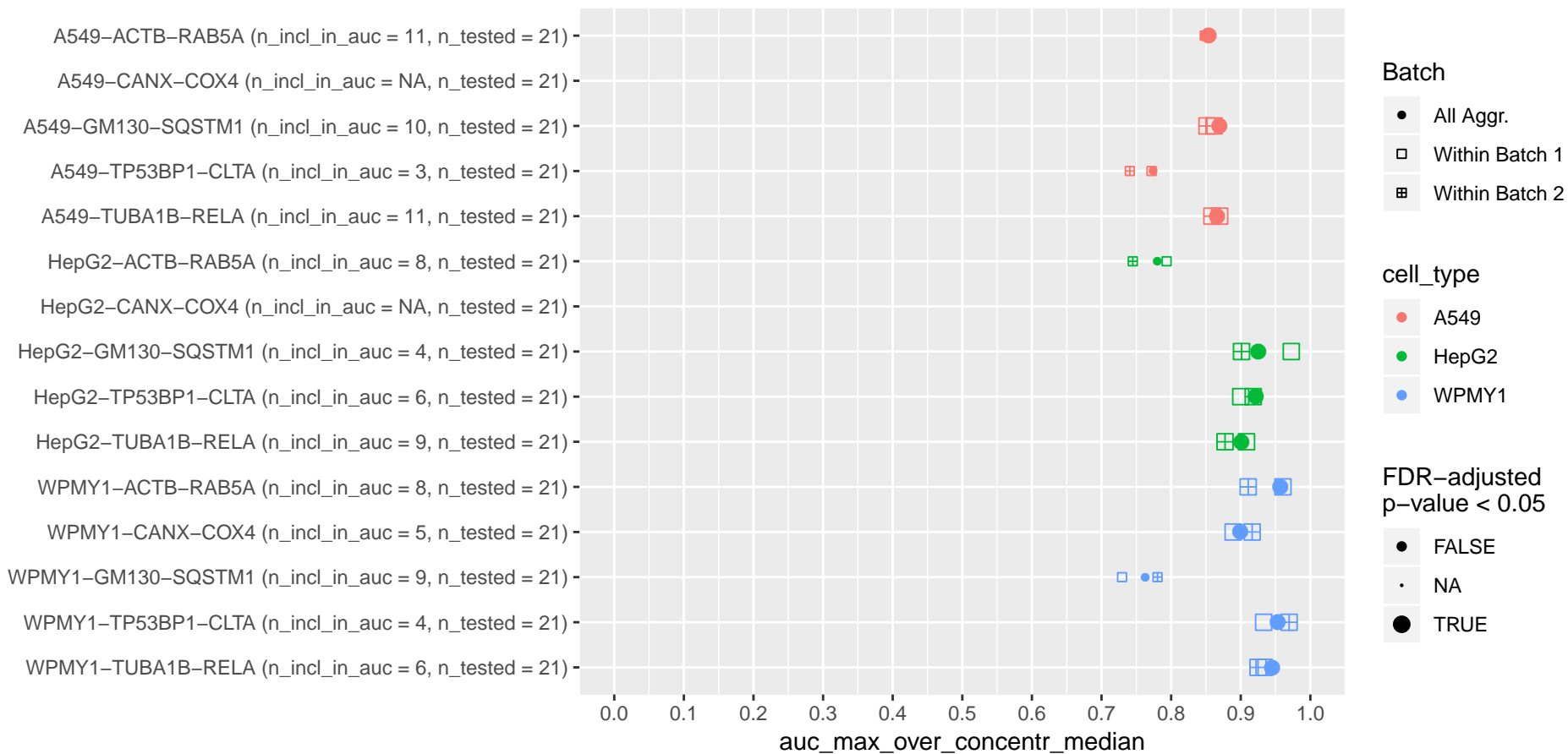
# Microtubule<sup>^</sup>inhibitor



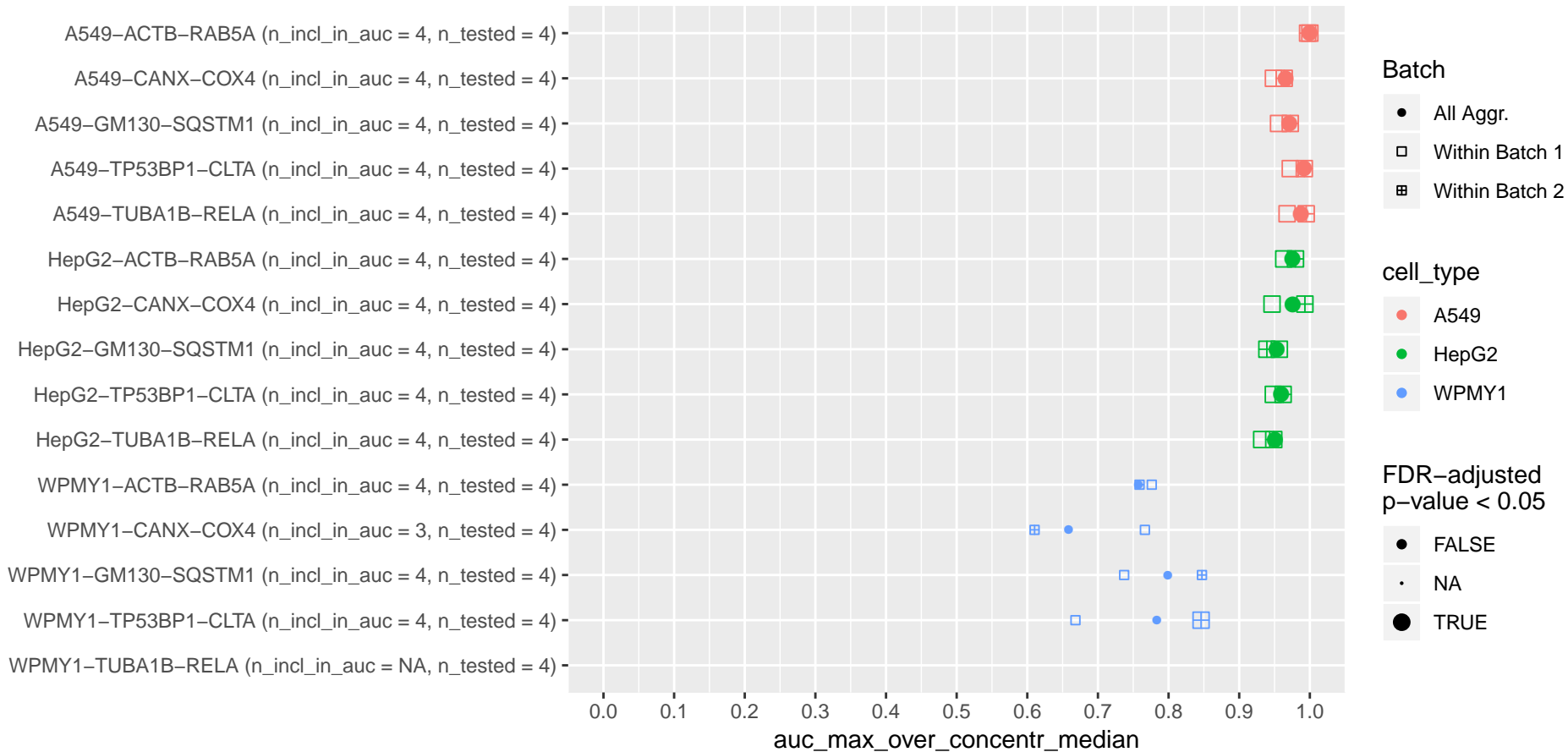
# Microtubule^stabilizer



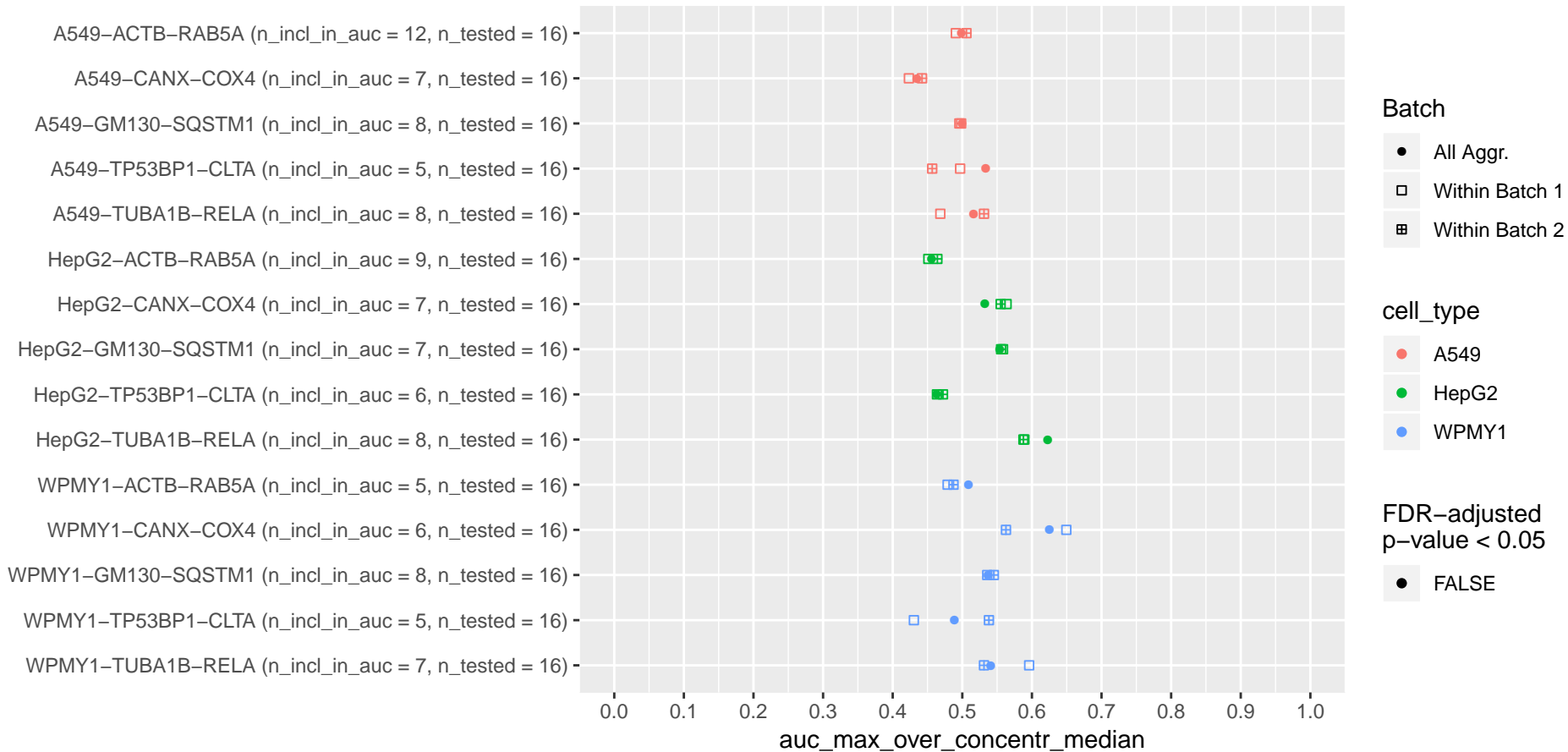
# Monoamine transporter (SLC6A2-4)<sup>hi</sup>inhibitor



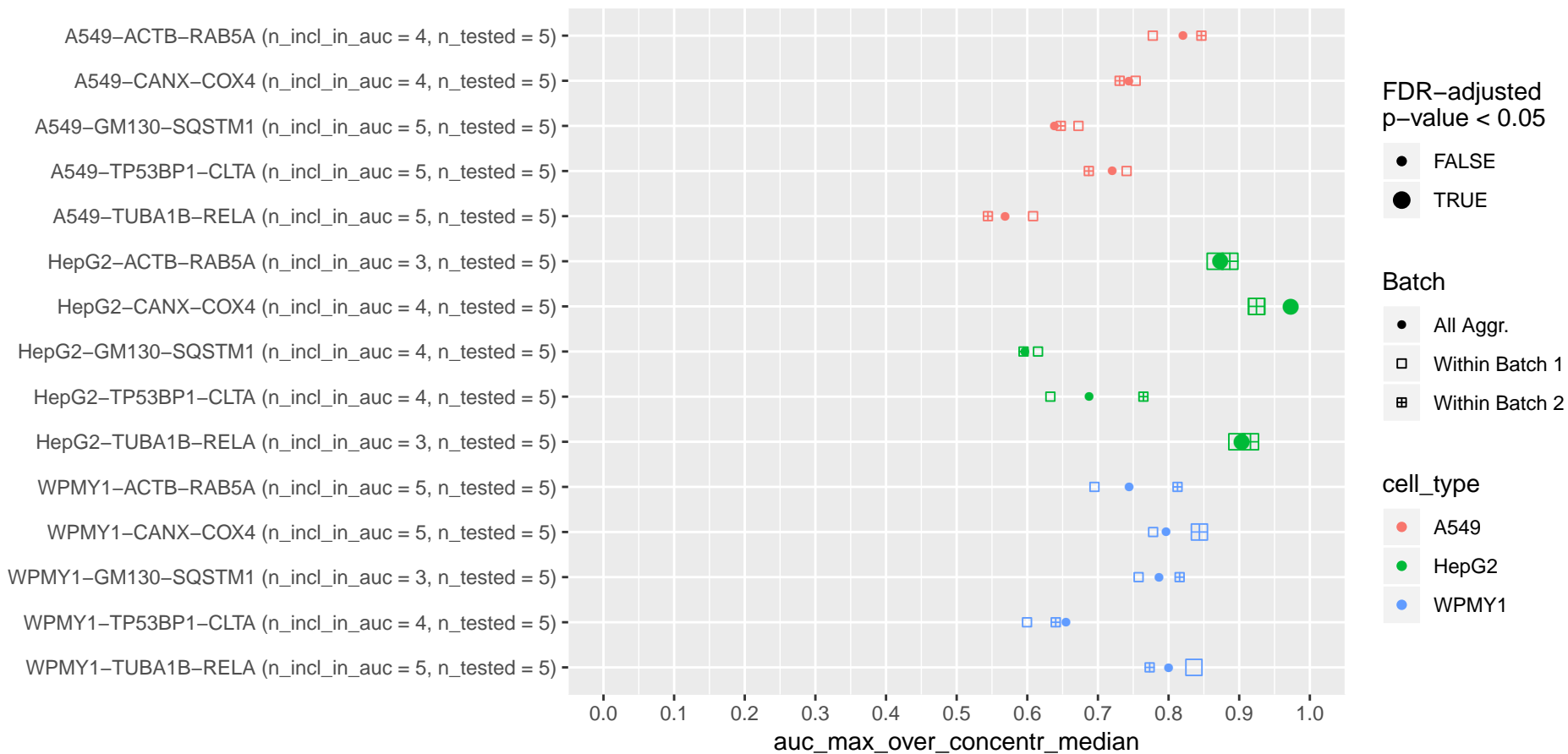
# Monopolar spindle 1 kinase<sup>inhibitor</sup>



# NFkB pathway^inhibitor

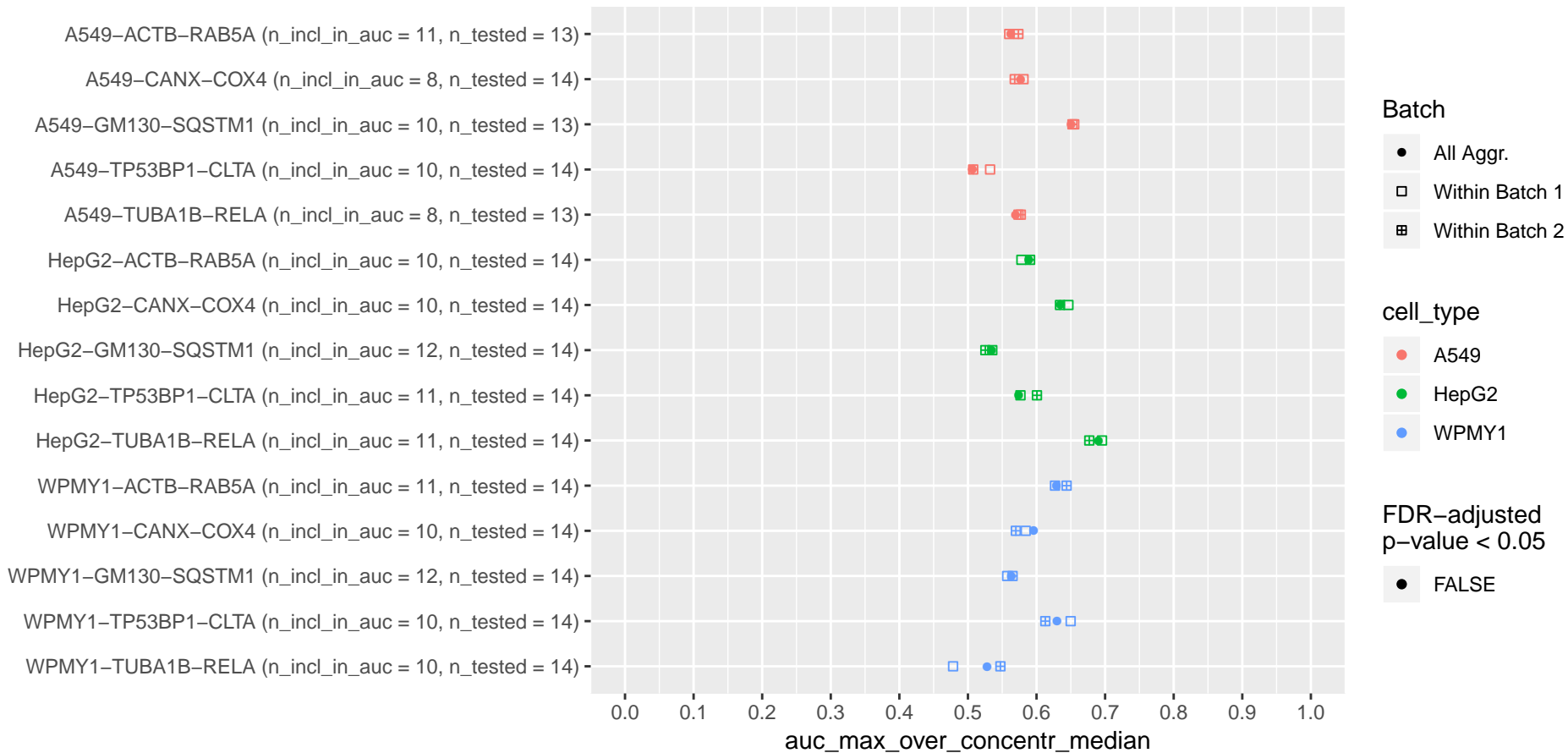


# Non-selective Tyrosine kinase<sup>in</sup>hibitor

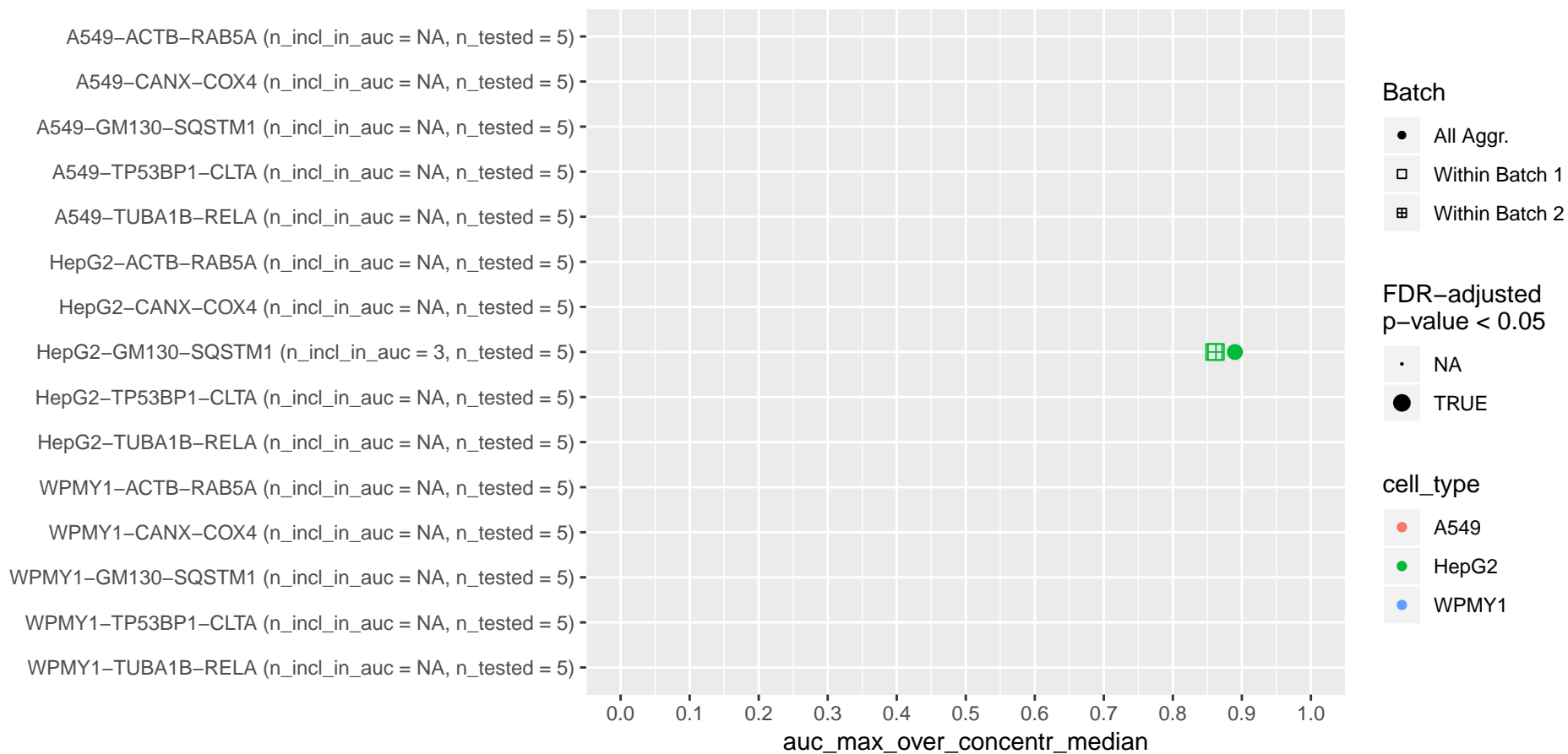




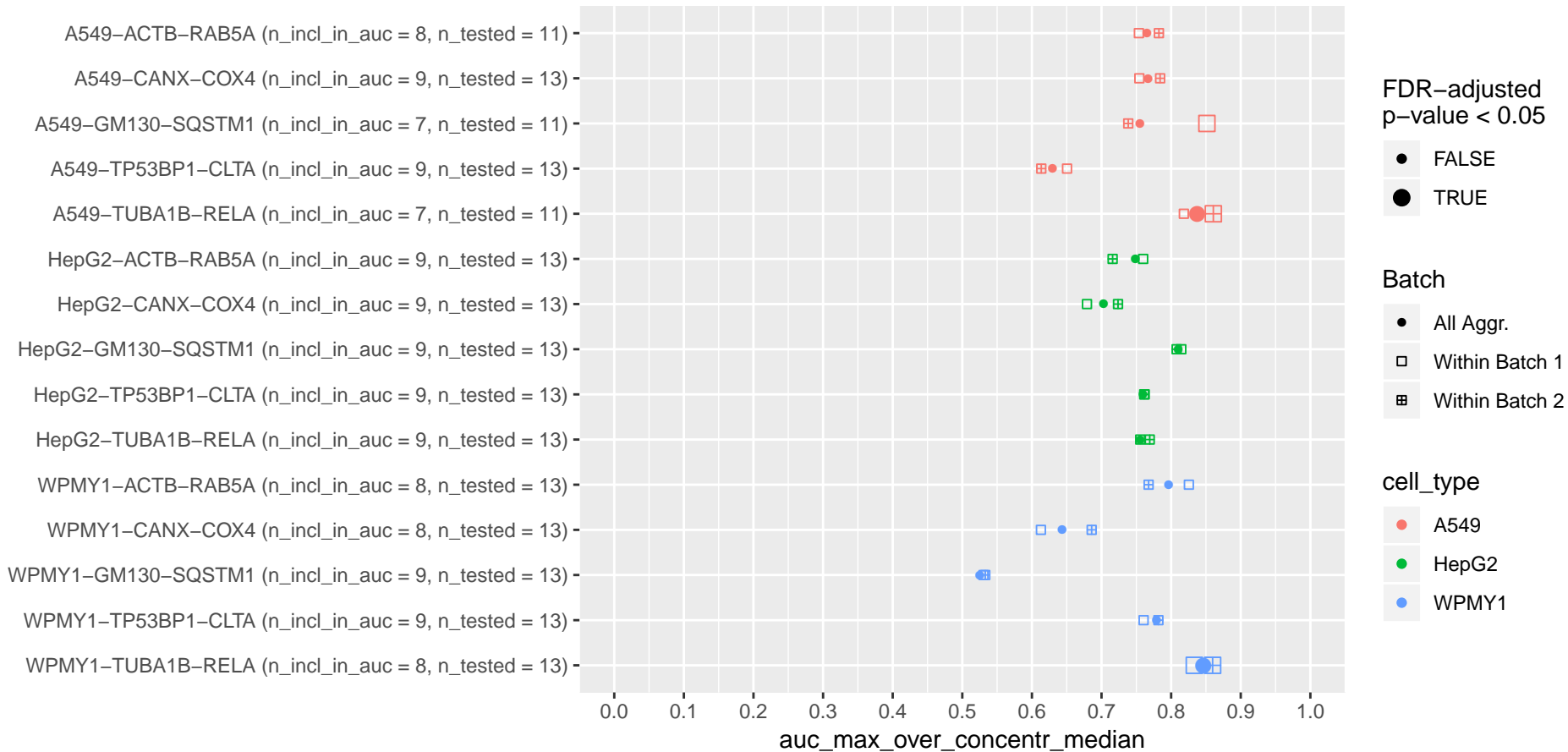
# Non-selective kinase<sup>^</sup>inhibitor



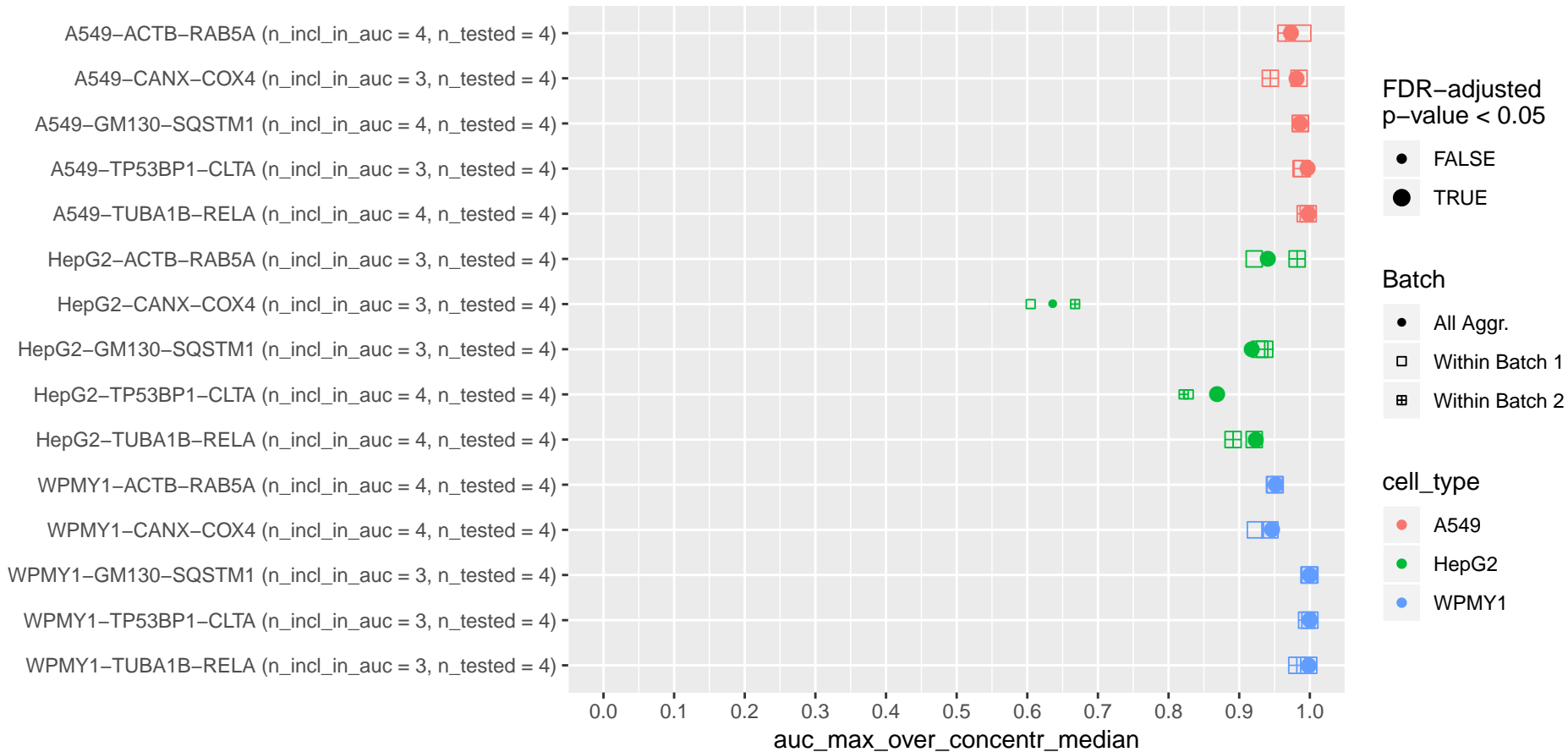
# Nrf2^activator



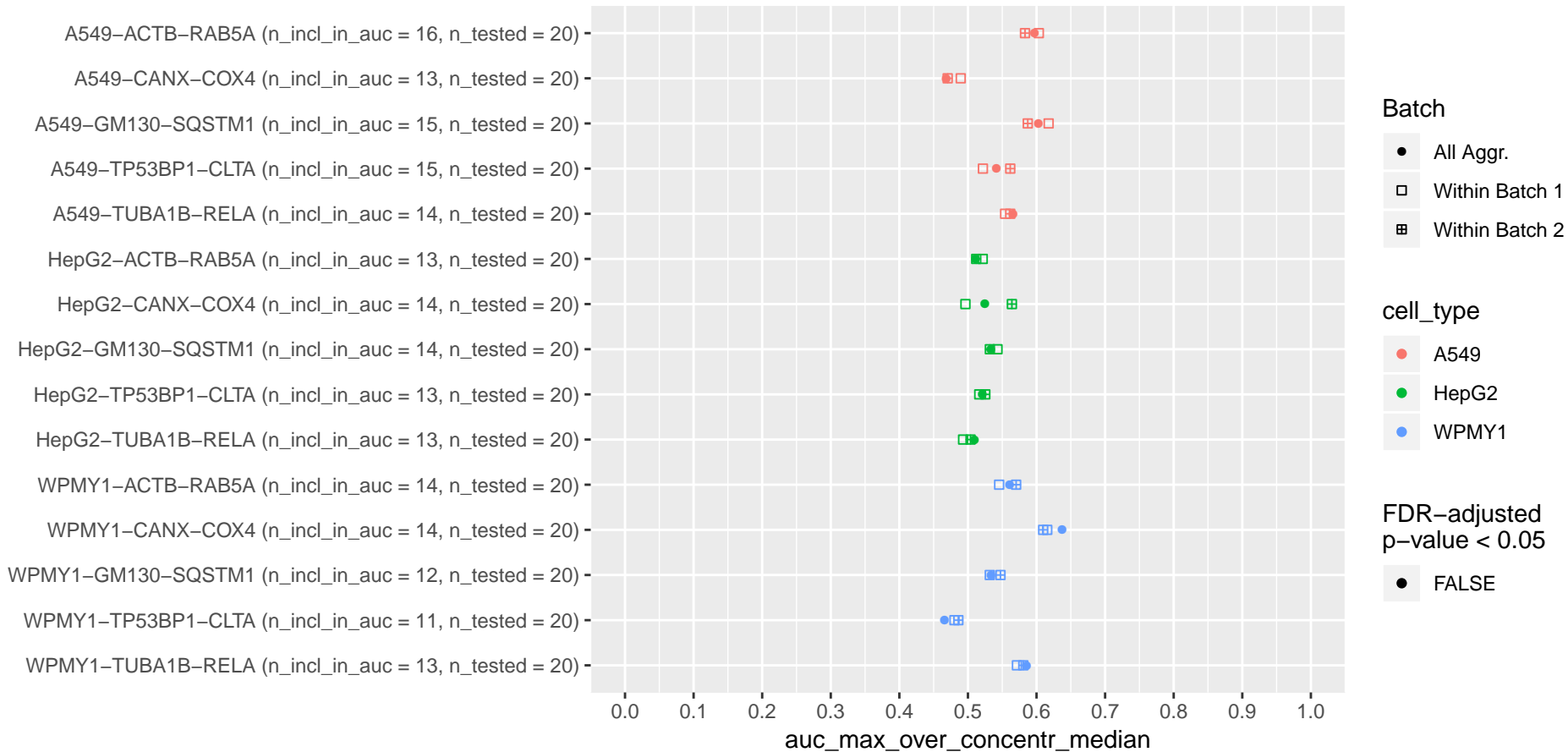
# Nucleoside analog



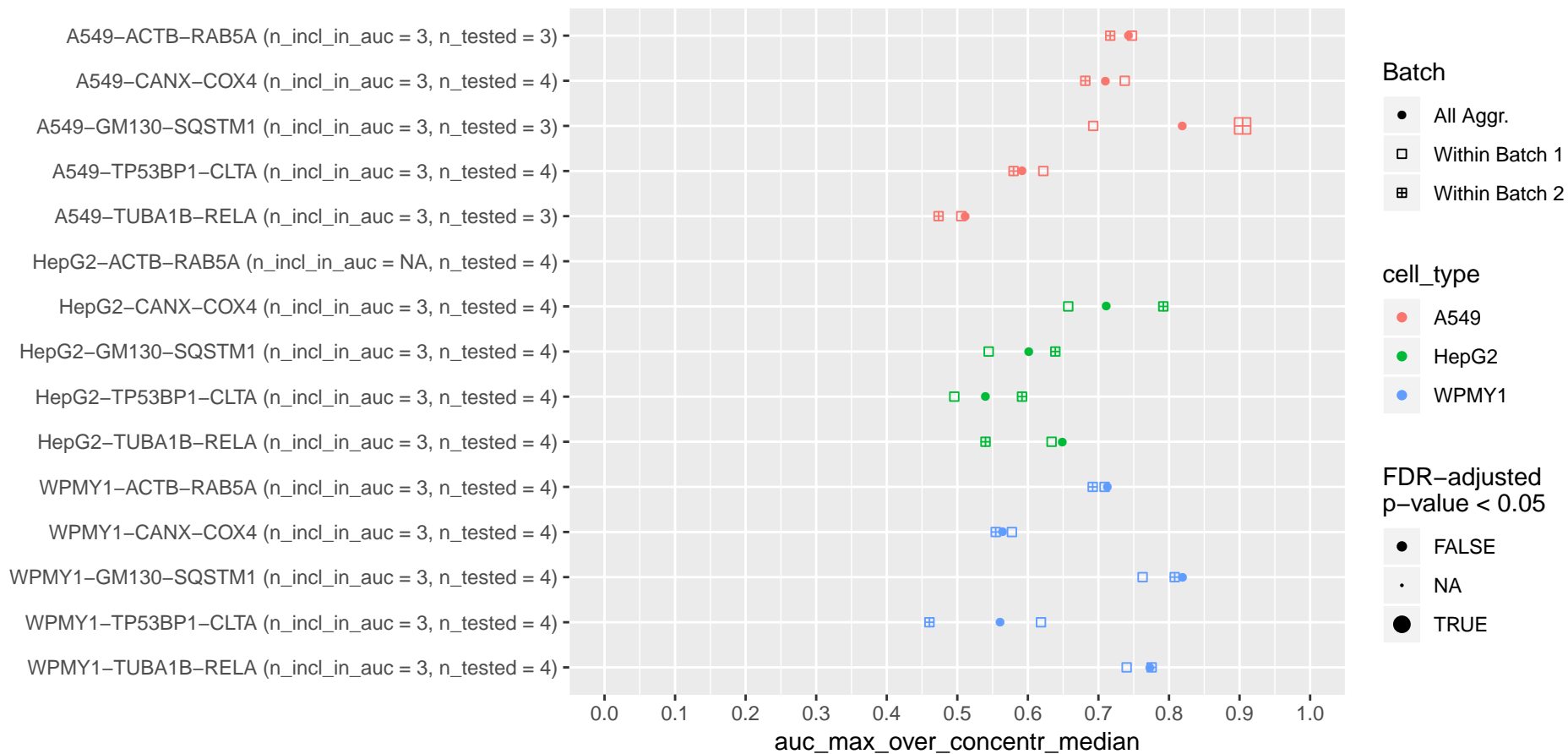
# Oxidative phosphorylation^uncoupler



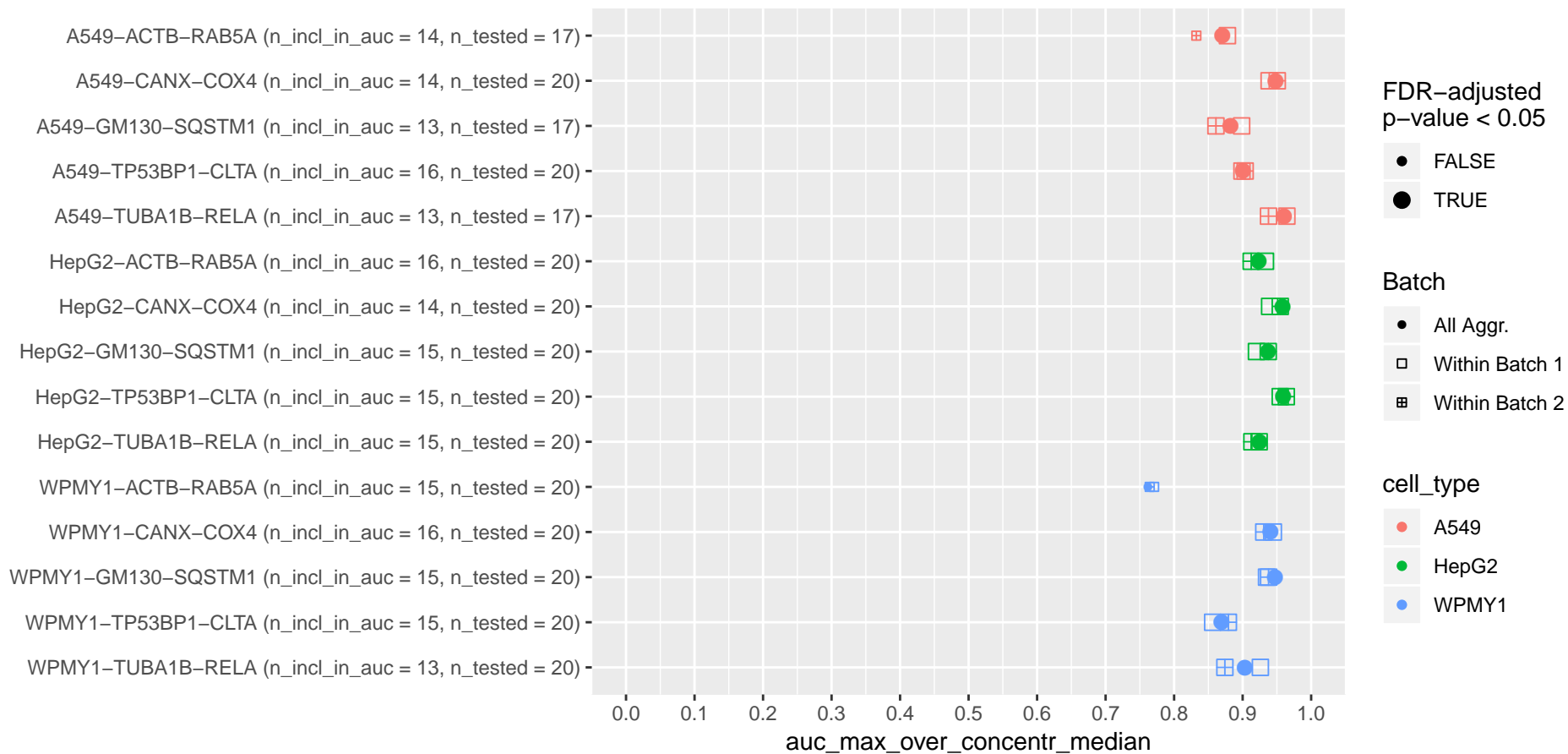
# PDGFR family^inhibitor



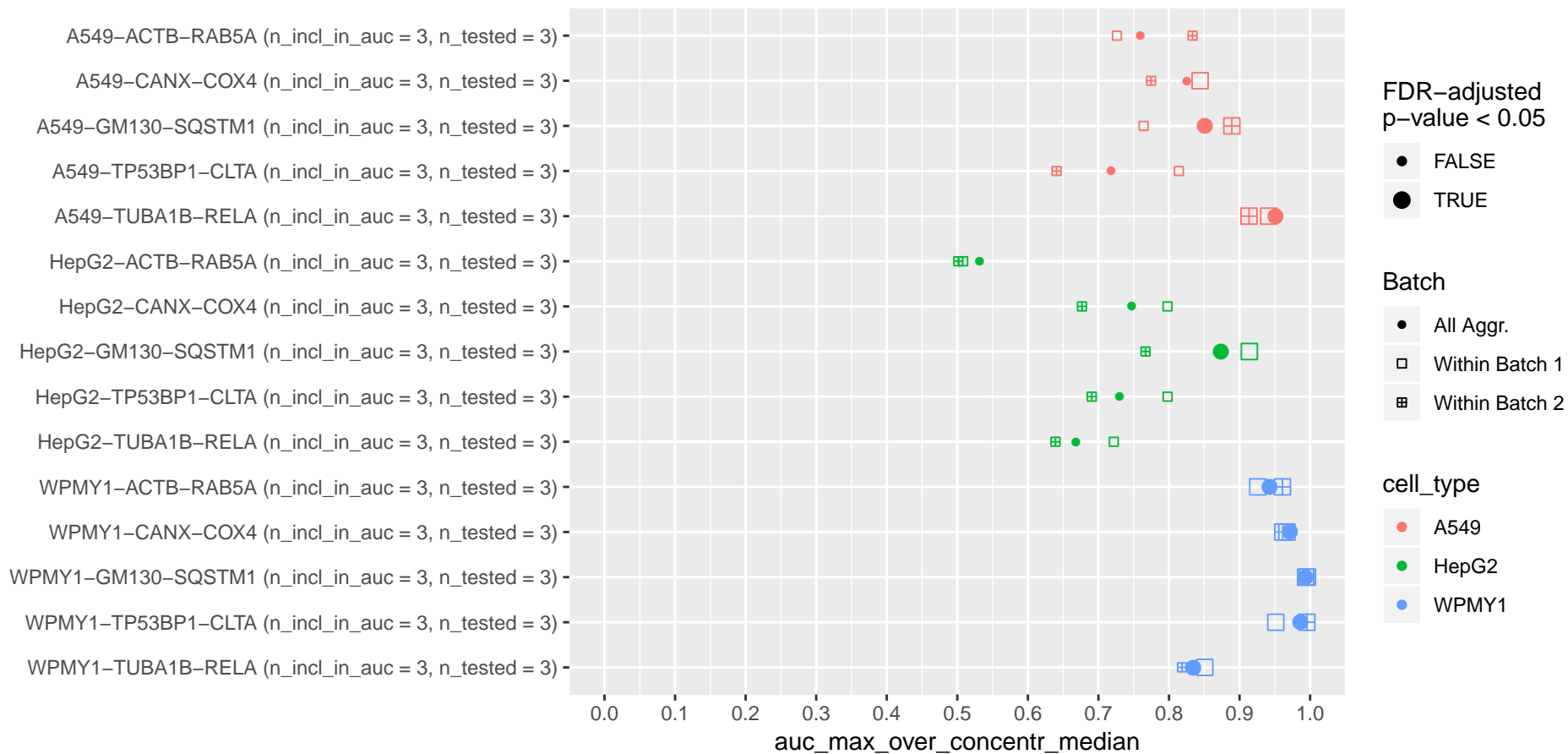
# PDK1<sup>inhibitor</sup>



# PI3K<sup>in</sup>hibitor

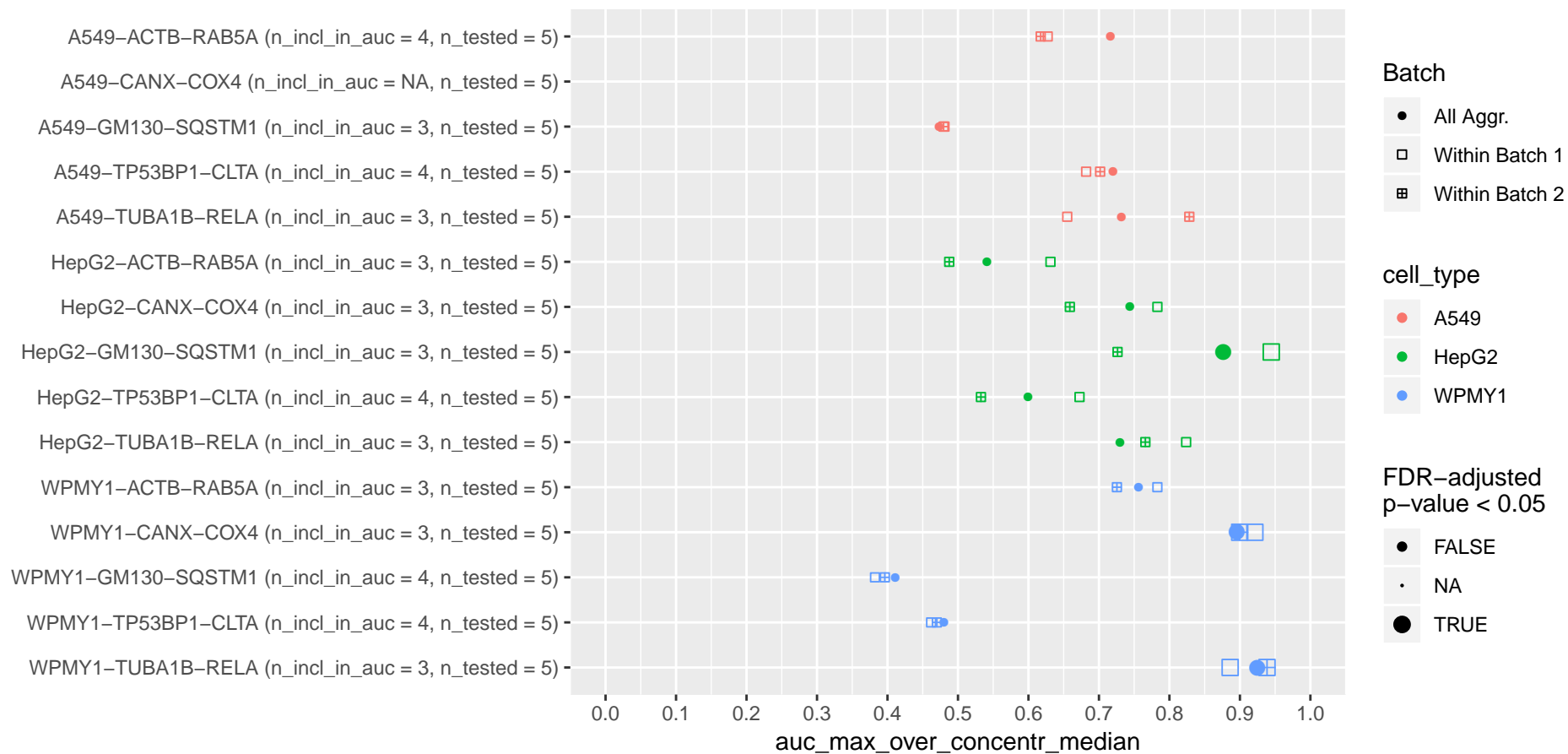


# PKA<sup>inhibitor</sup>

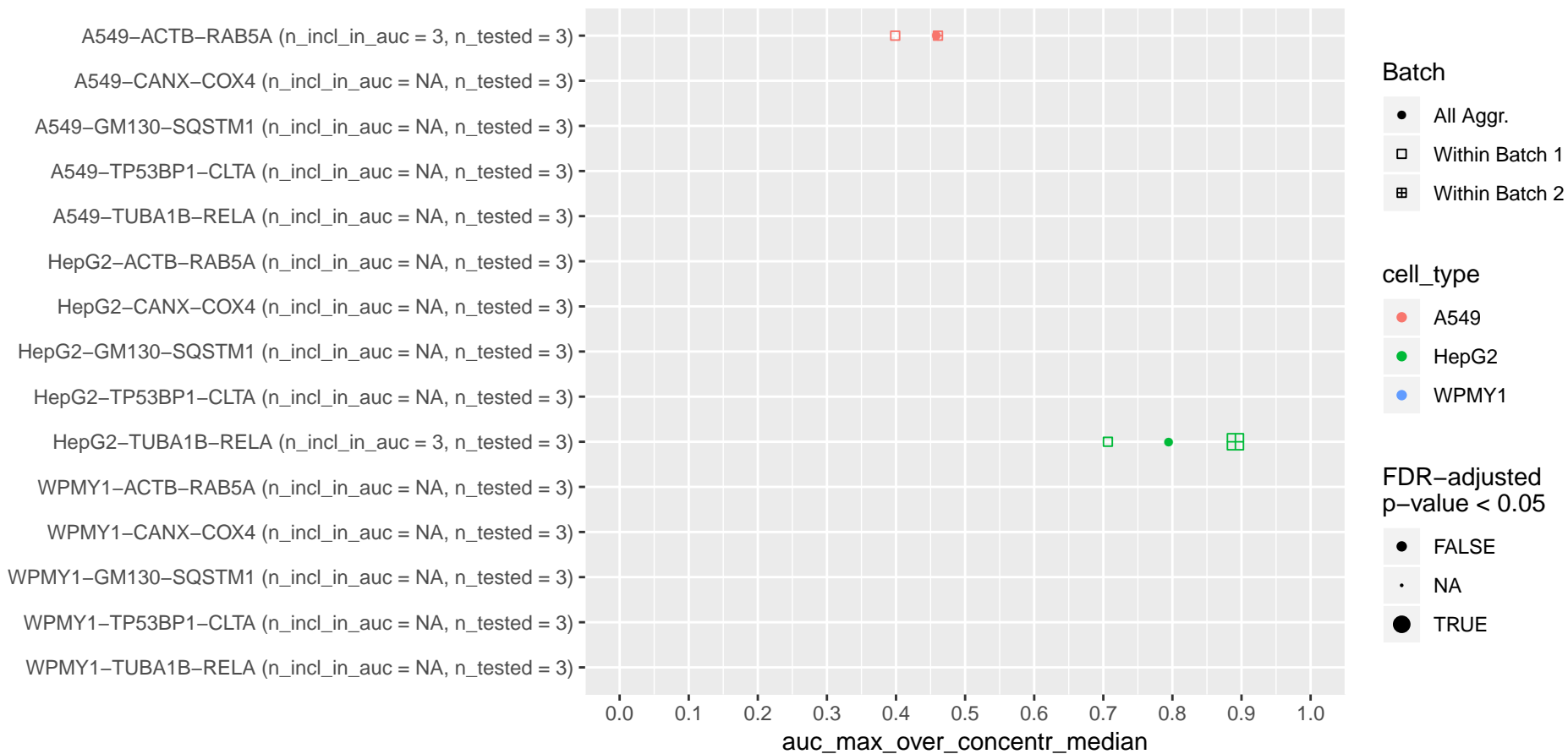




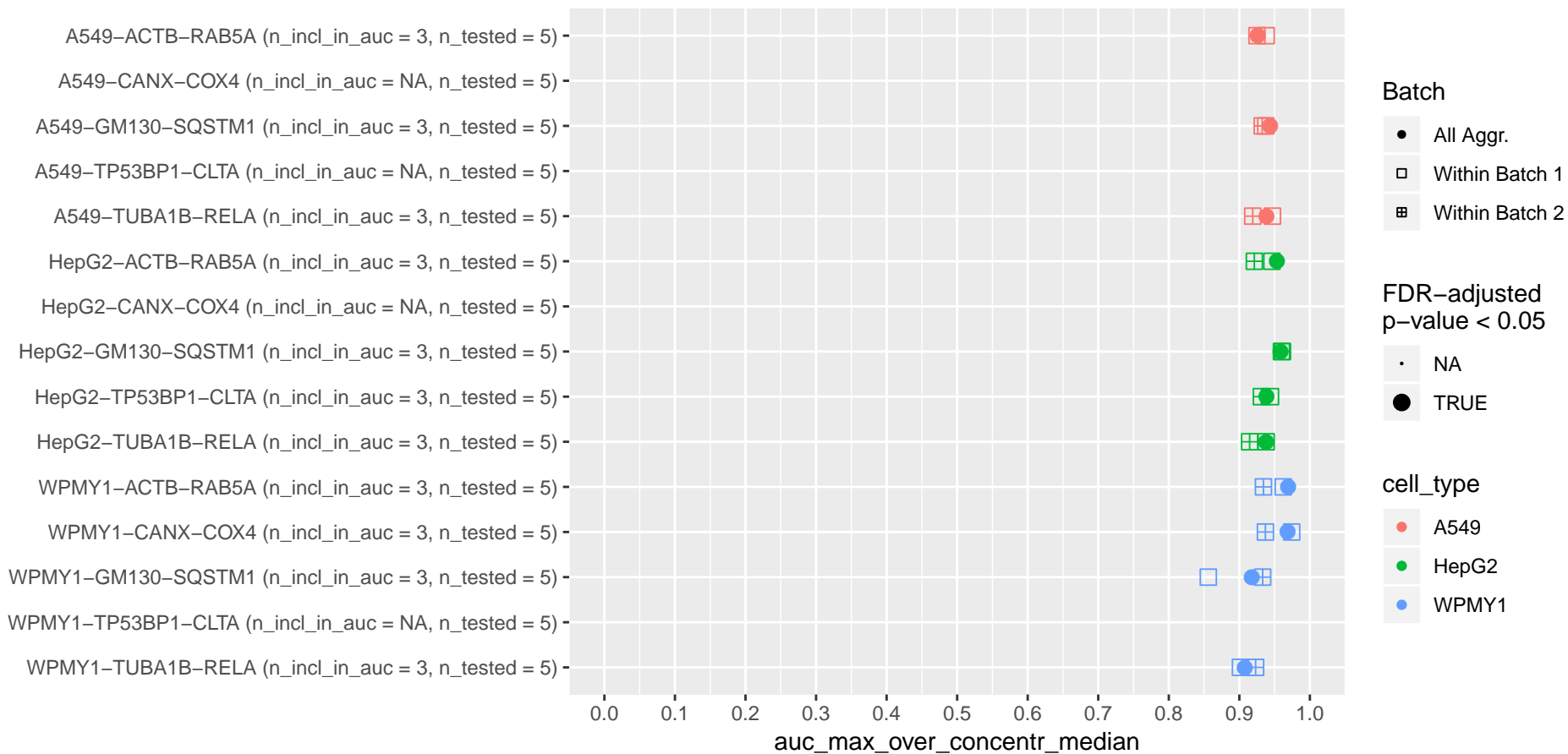
# PKC<sup>inhibitor</sup>



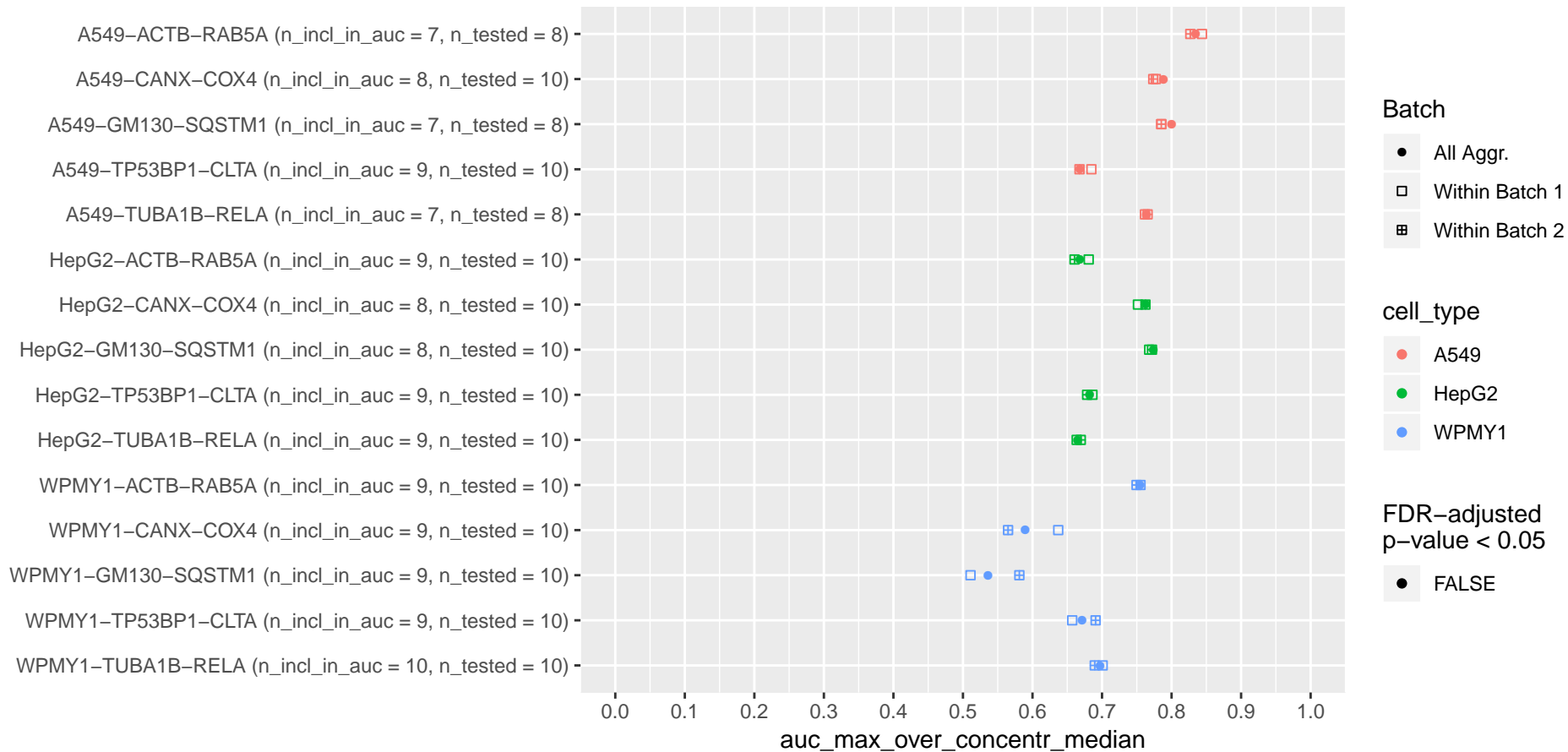
# PKD<sup>Δ</sup>inhibitor

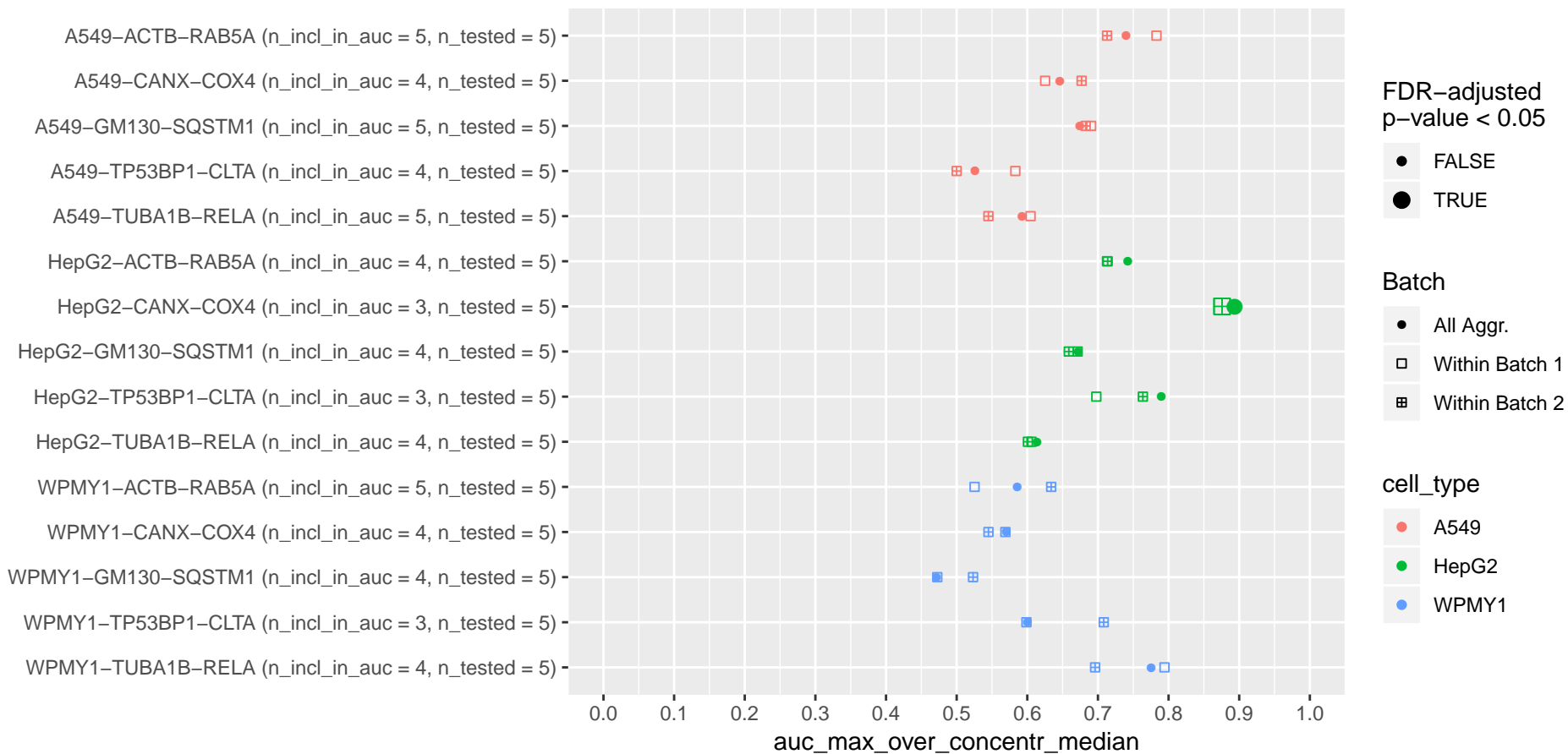


# Phospholipase<sup>i</sup>inhibitor

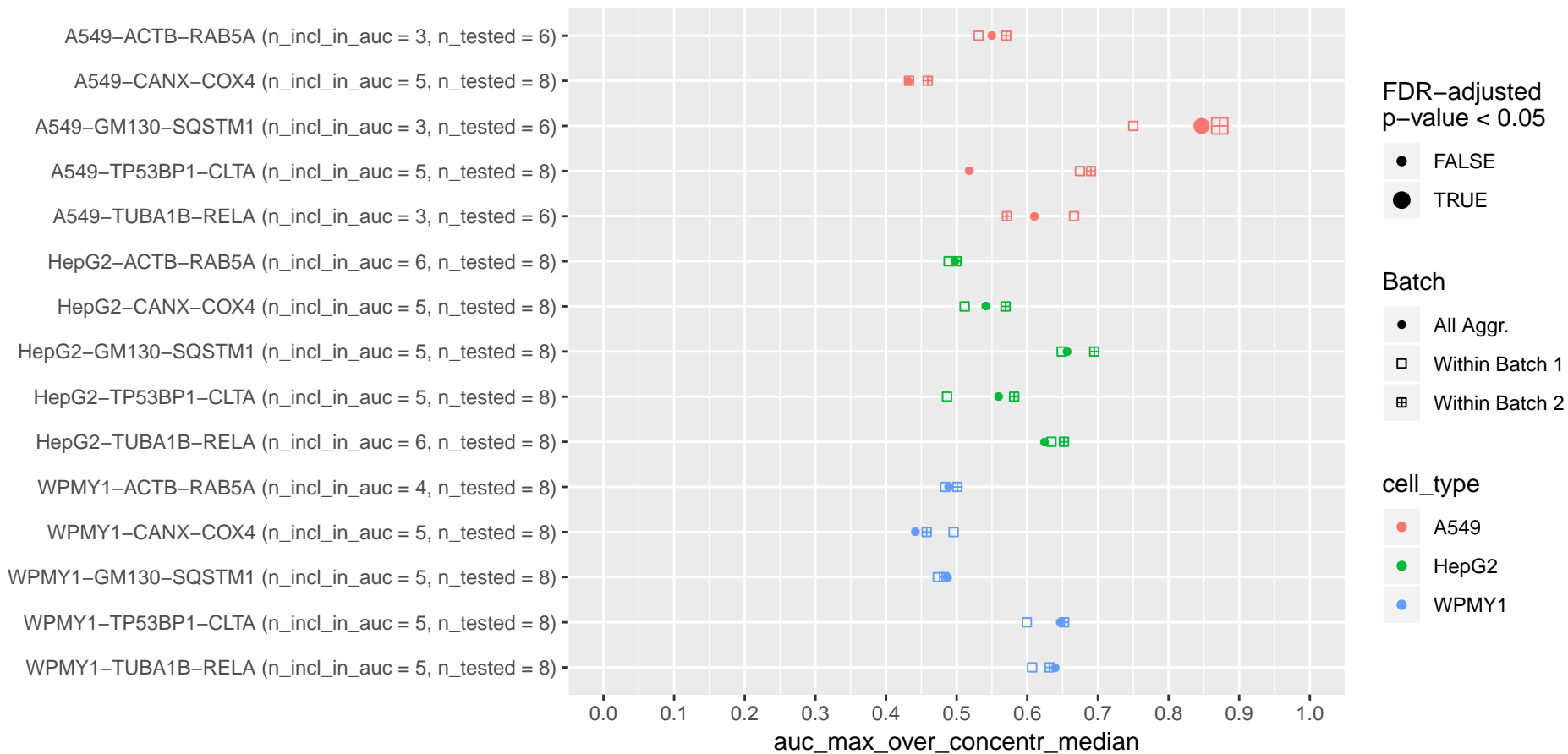


# Polo-like kinase<sup>inhibitor</sup>

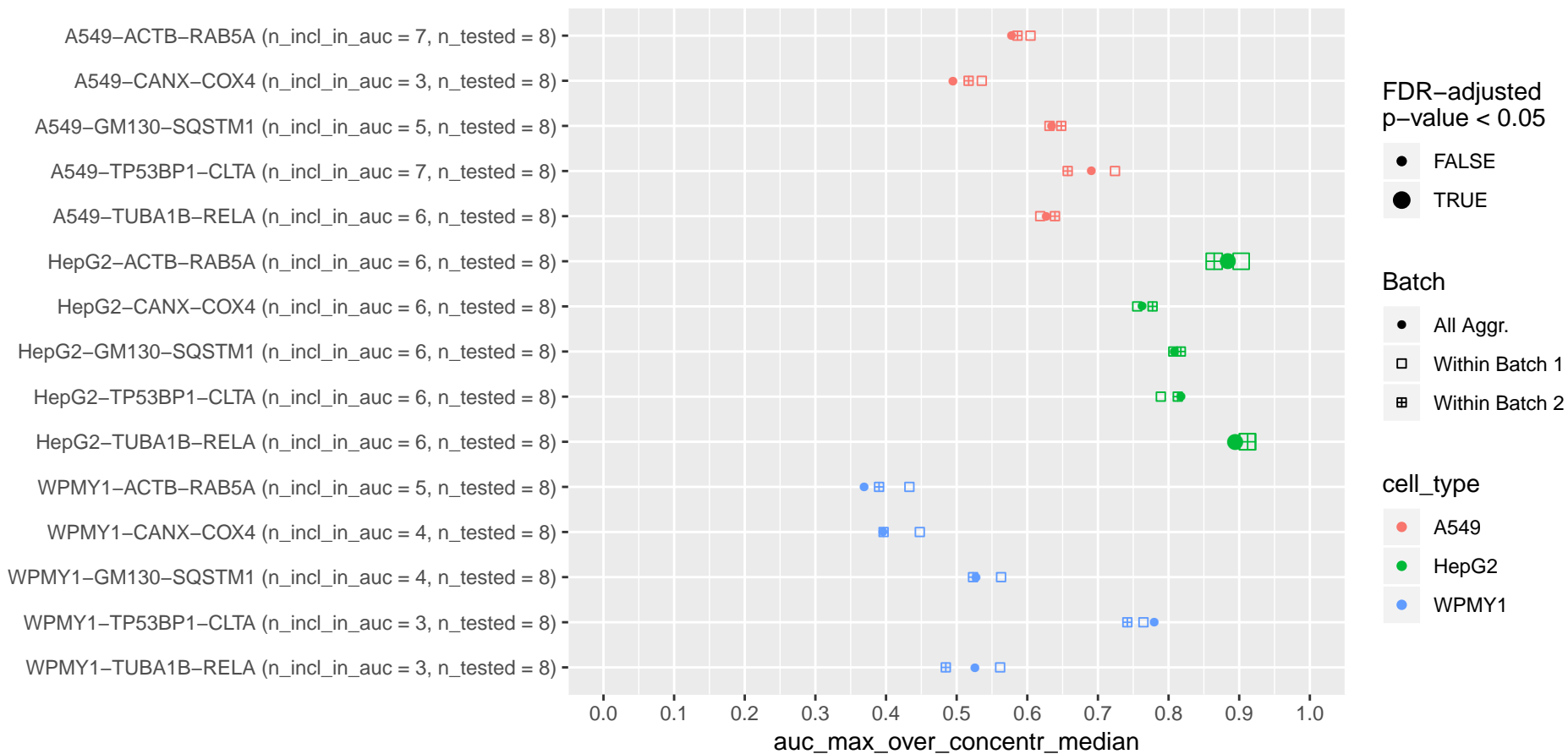


RET RTK<sup>inhibitor</sup>

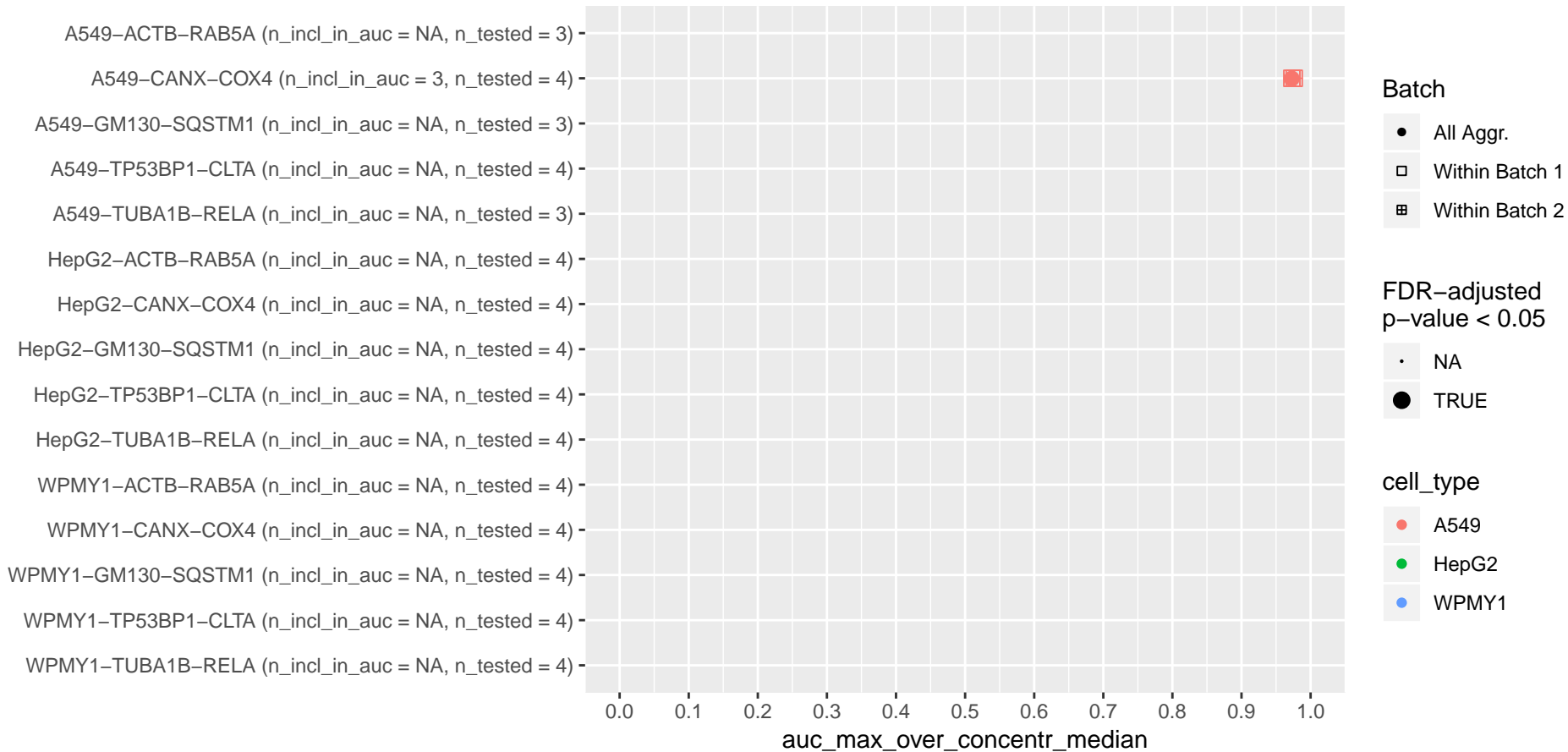
# RNA synthesis<sup>in</sup>hibitor



# Raf<sup>inhibitor</sup>

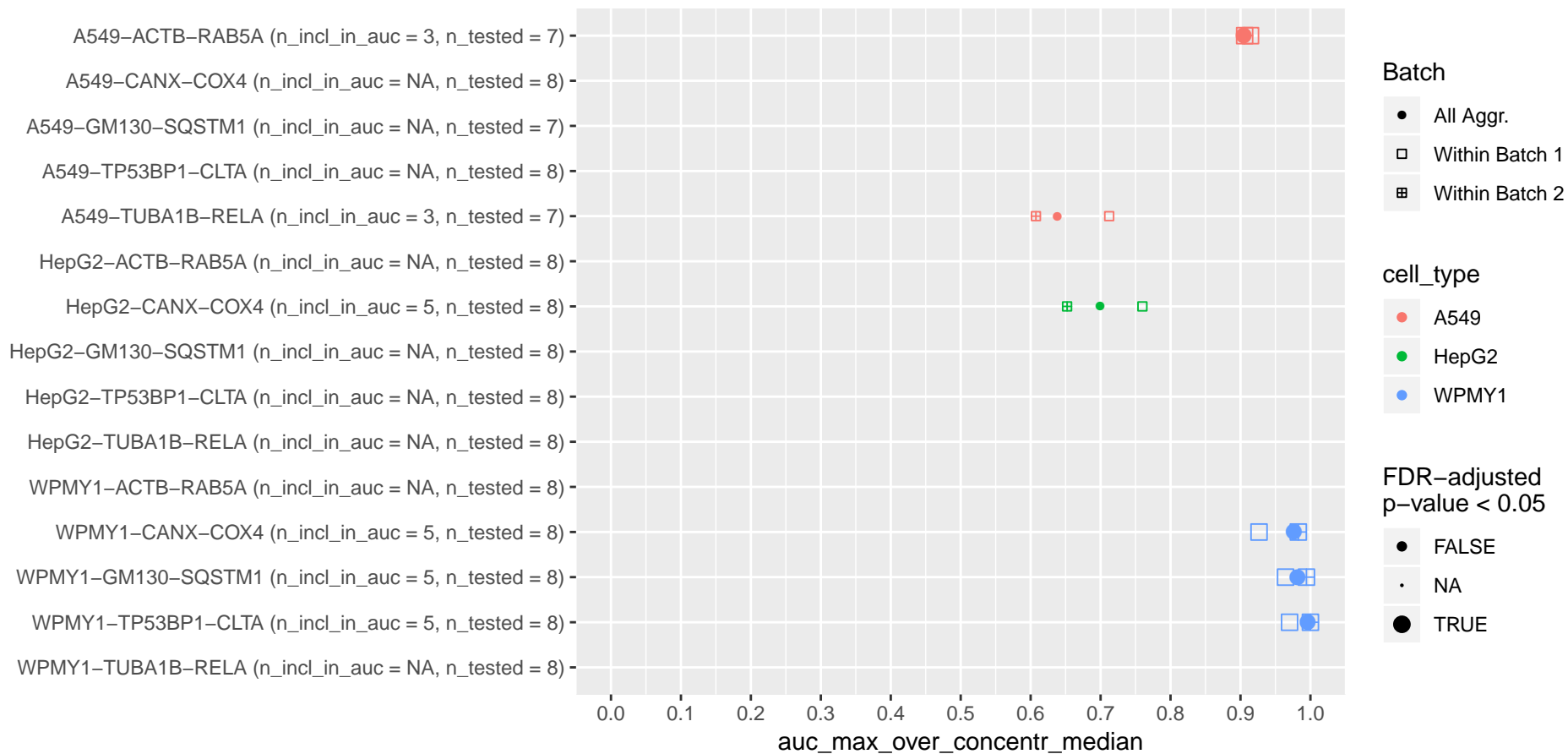


# Respiratory chain^inhibitor

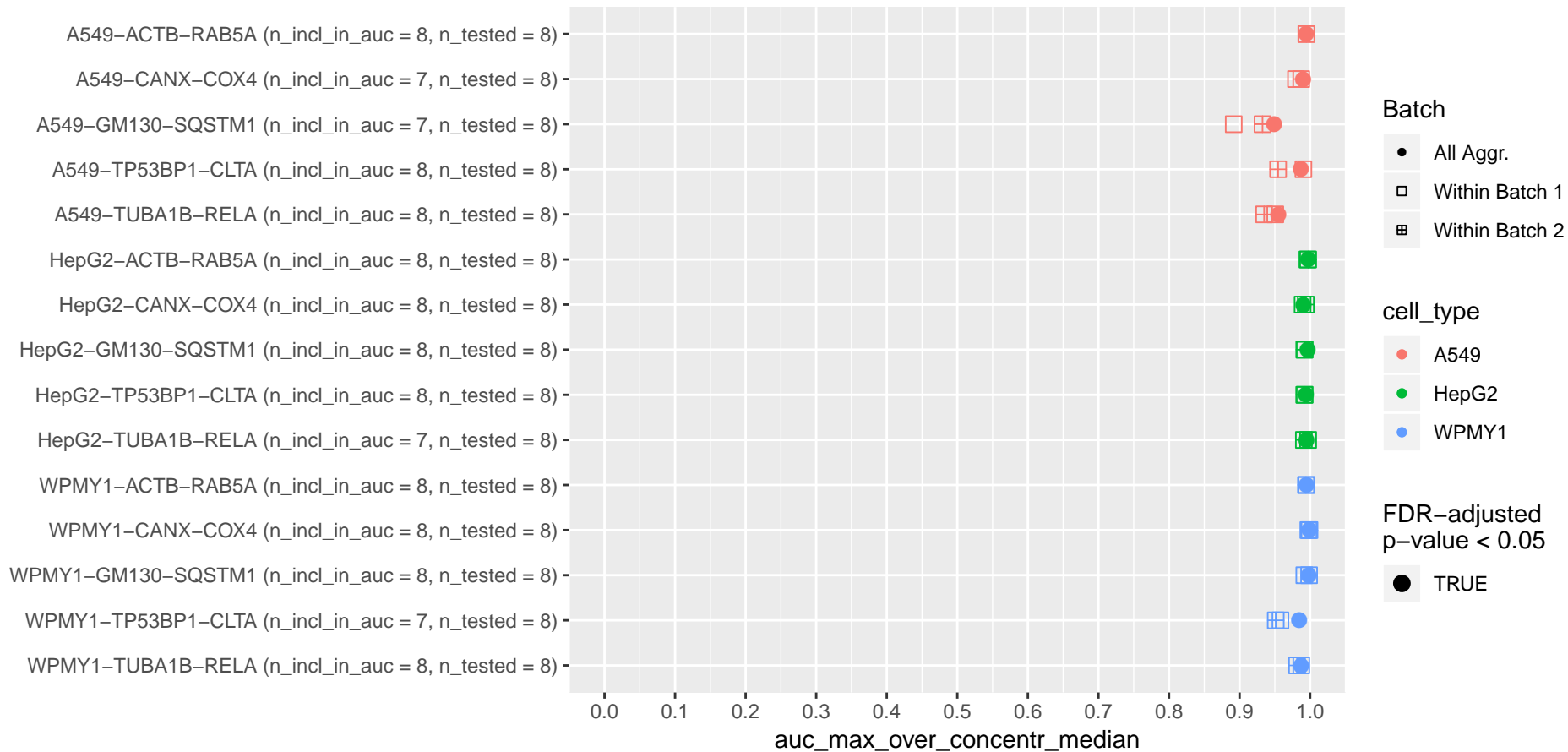




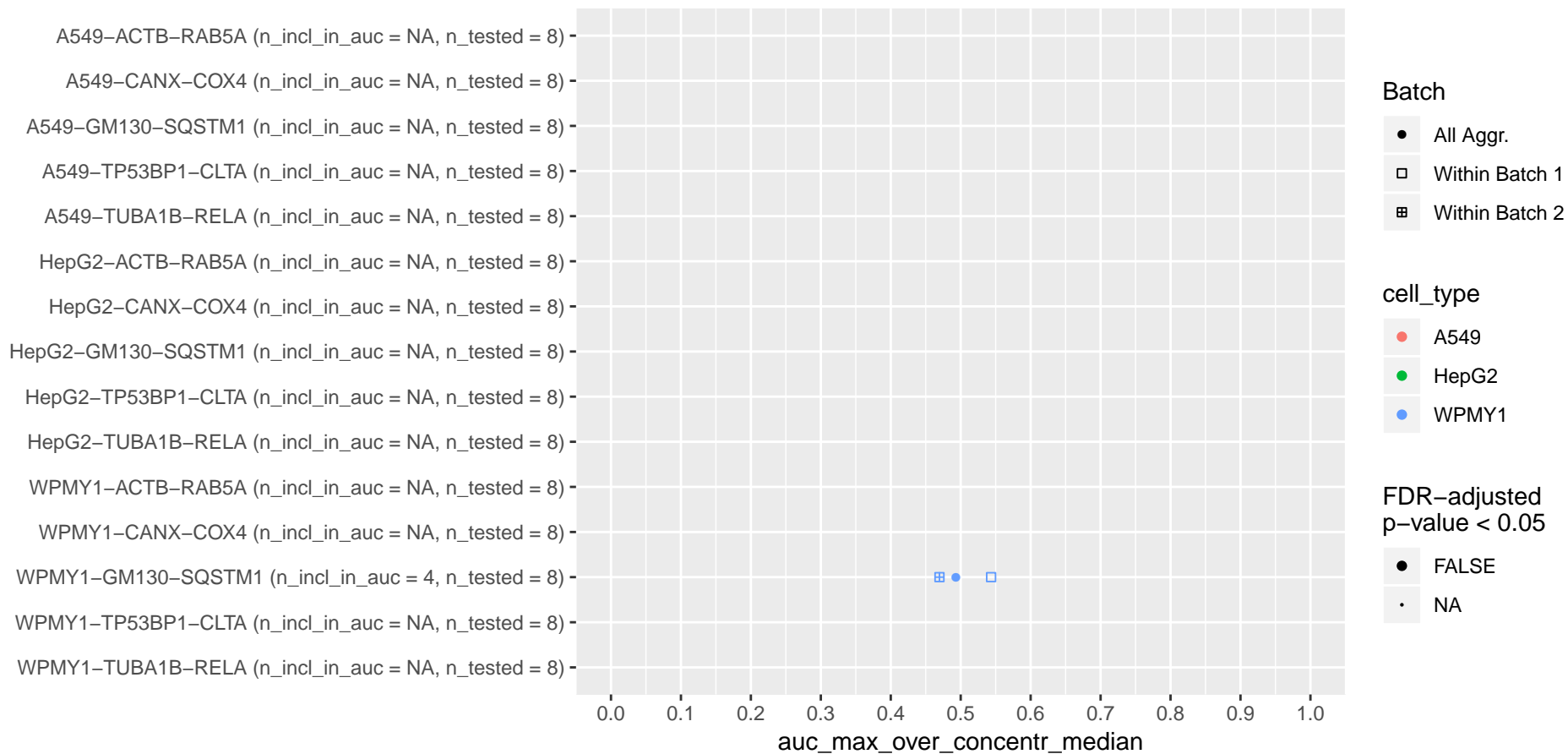
# Retinoic acid receptor^agonist



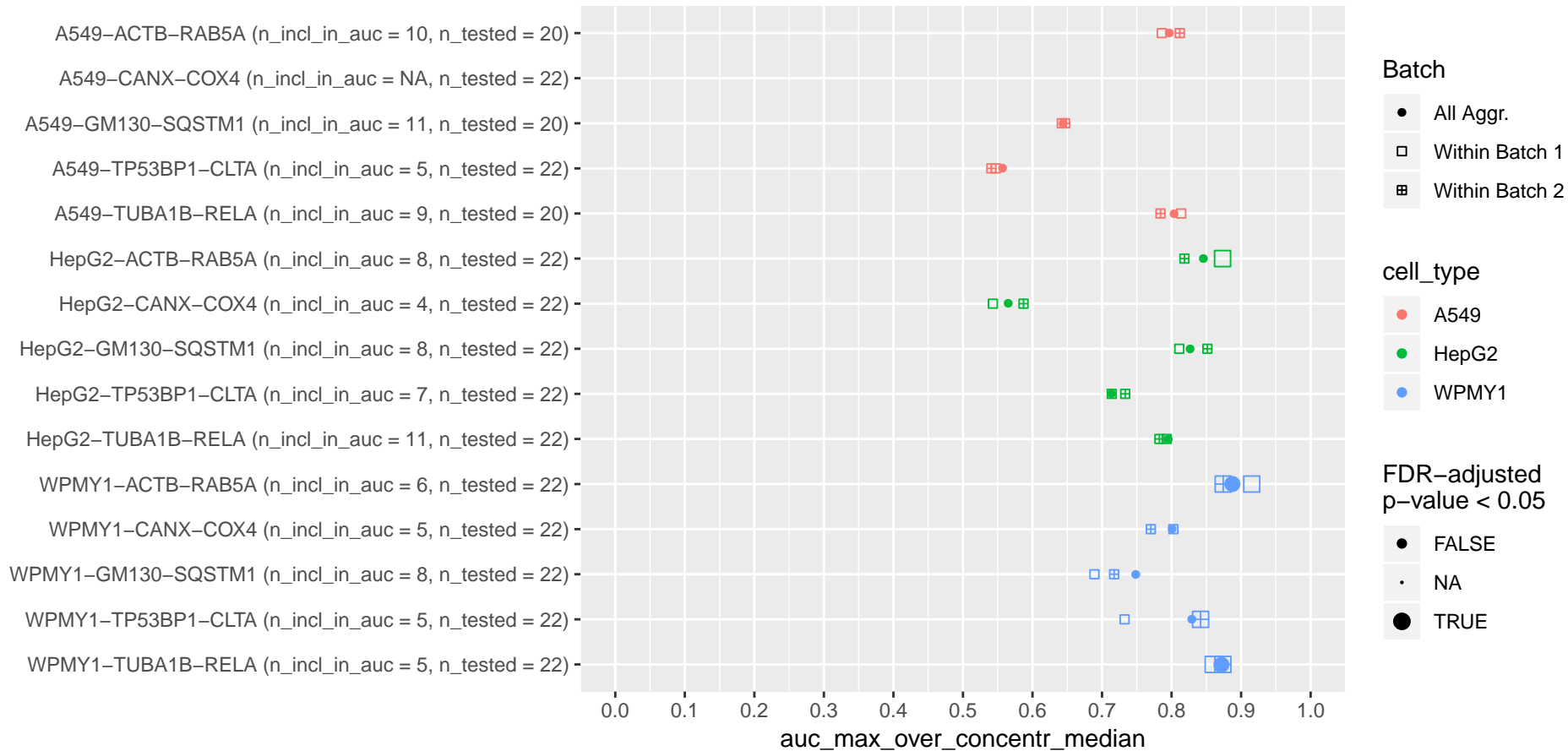
# Rho associated kinase<sup>inhibitor</sup>



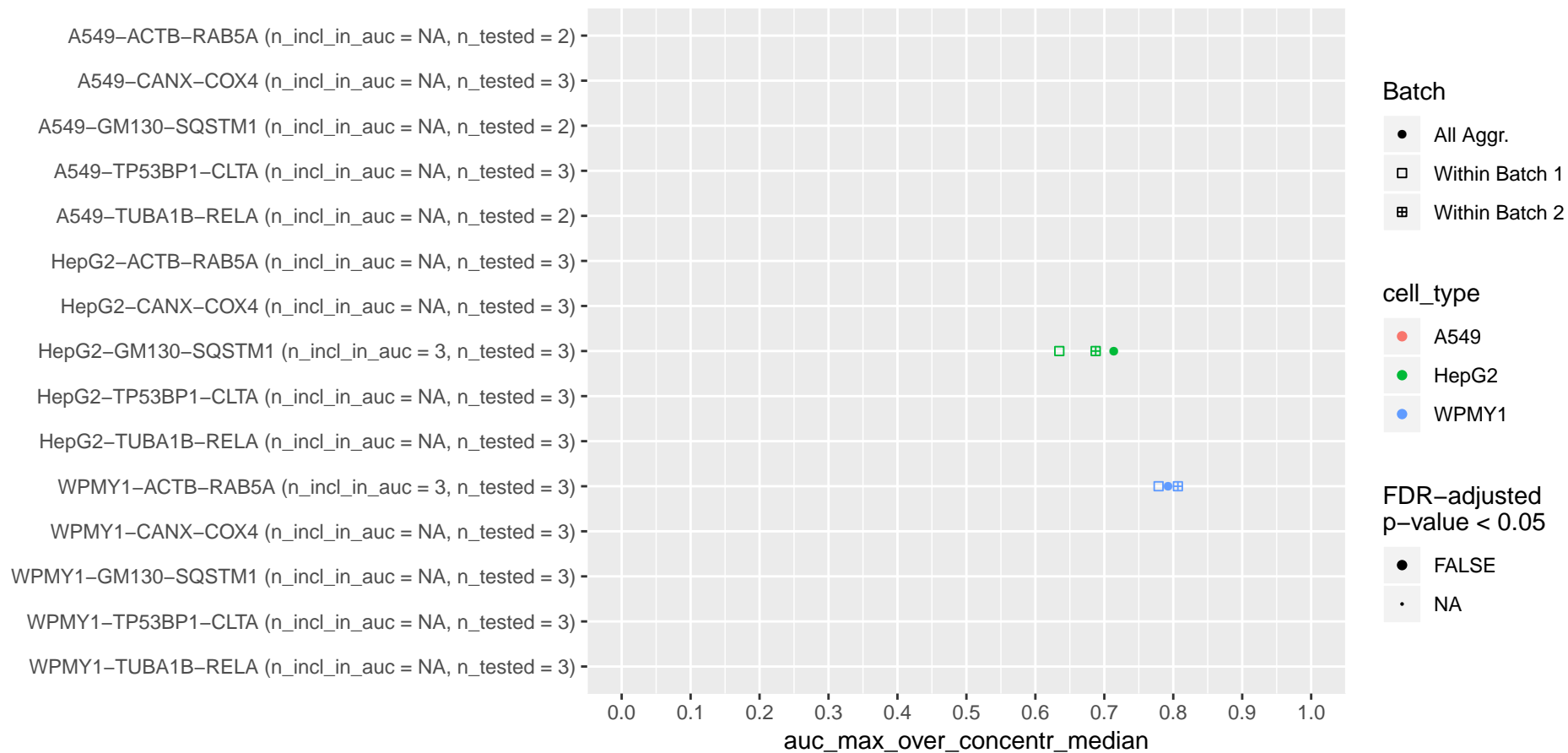
# Serotonin receptor^agonist



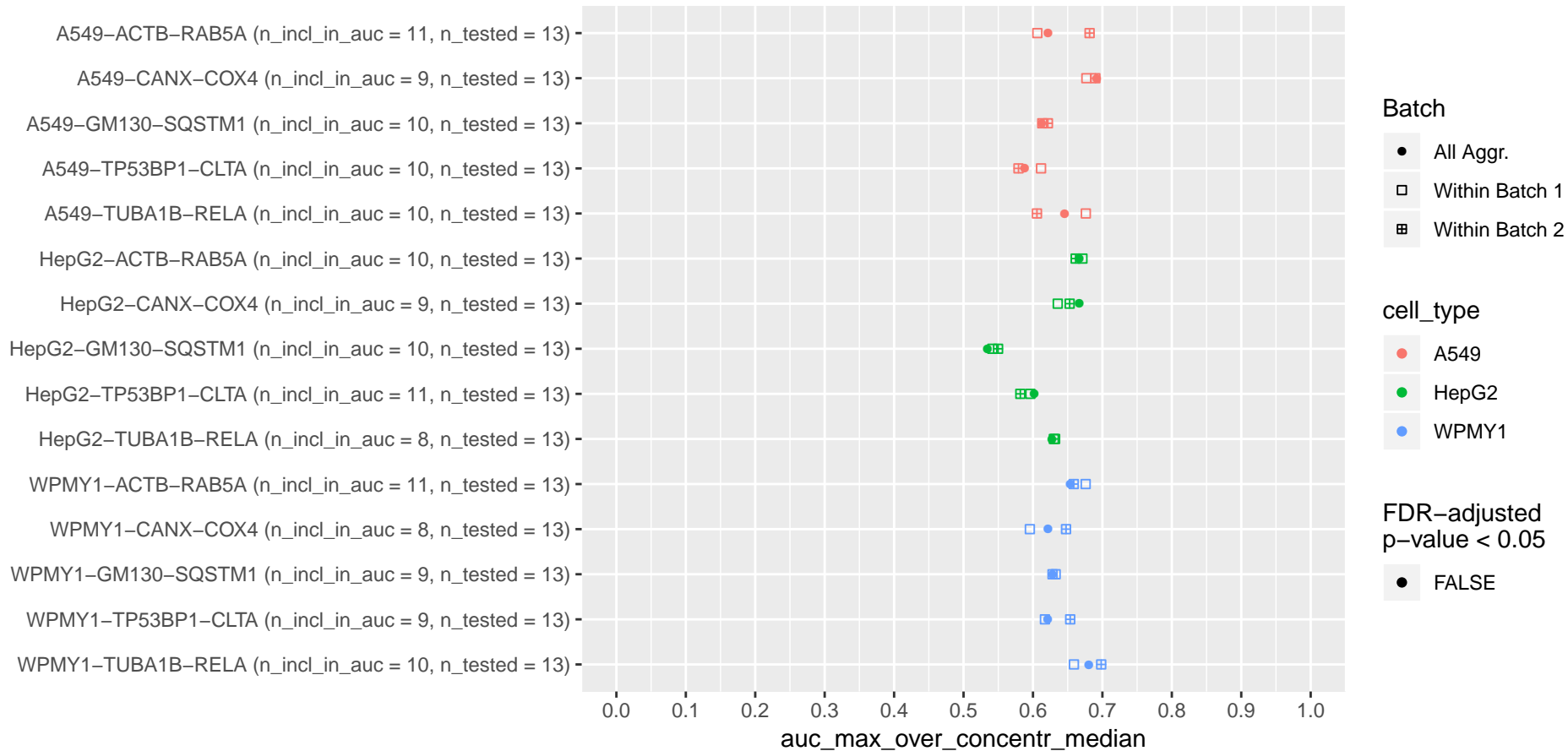
# Serotonin receptor^antagonist



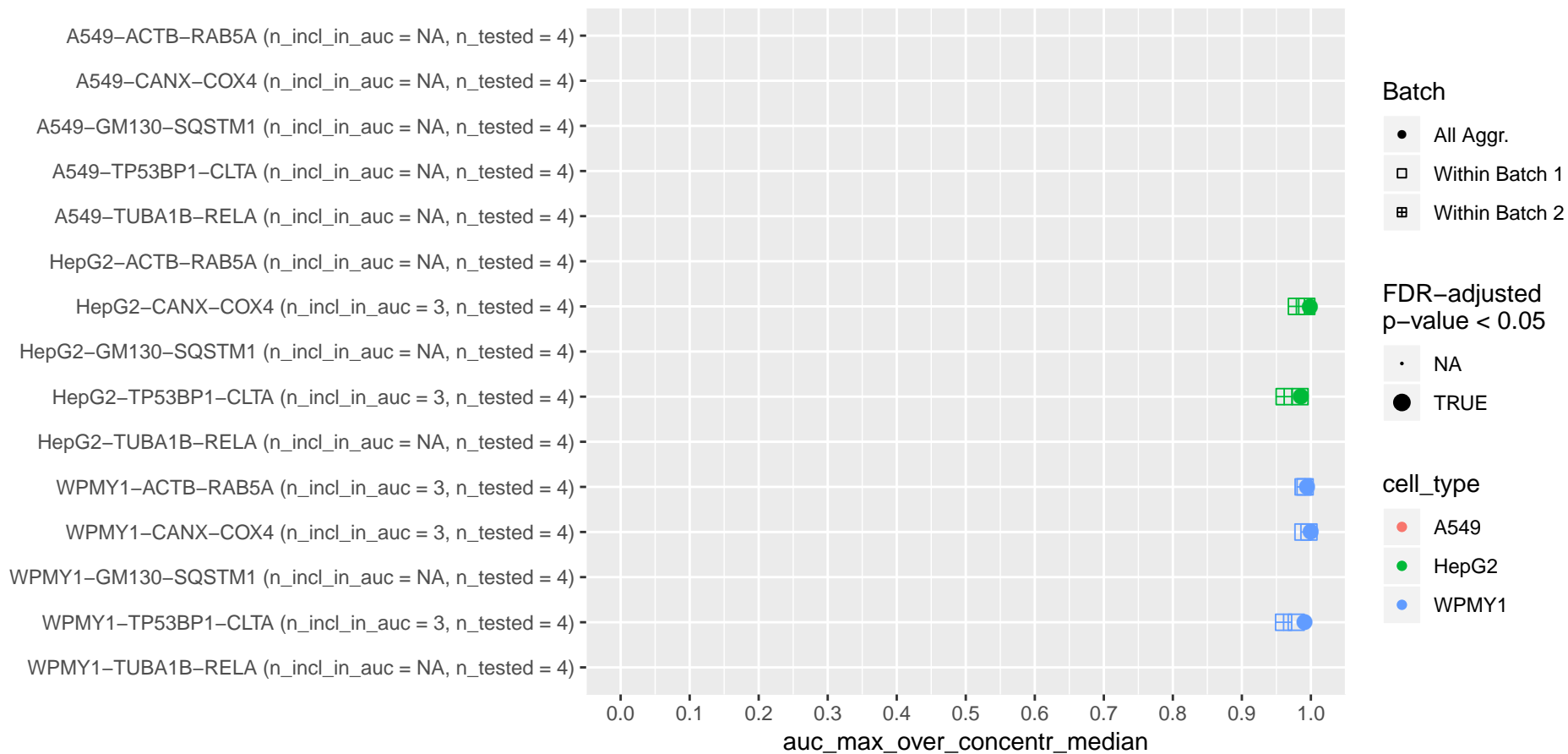
# Sphingosine kinase<sup>1</sup>inhibitor



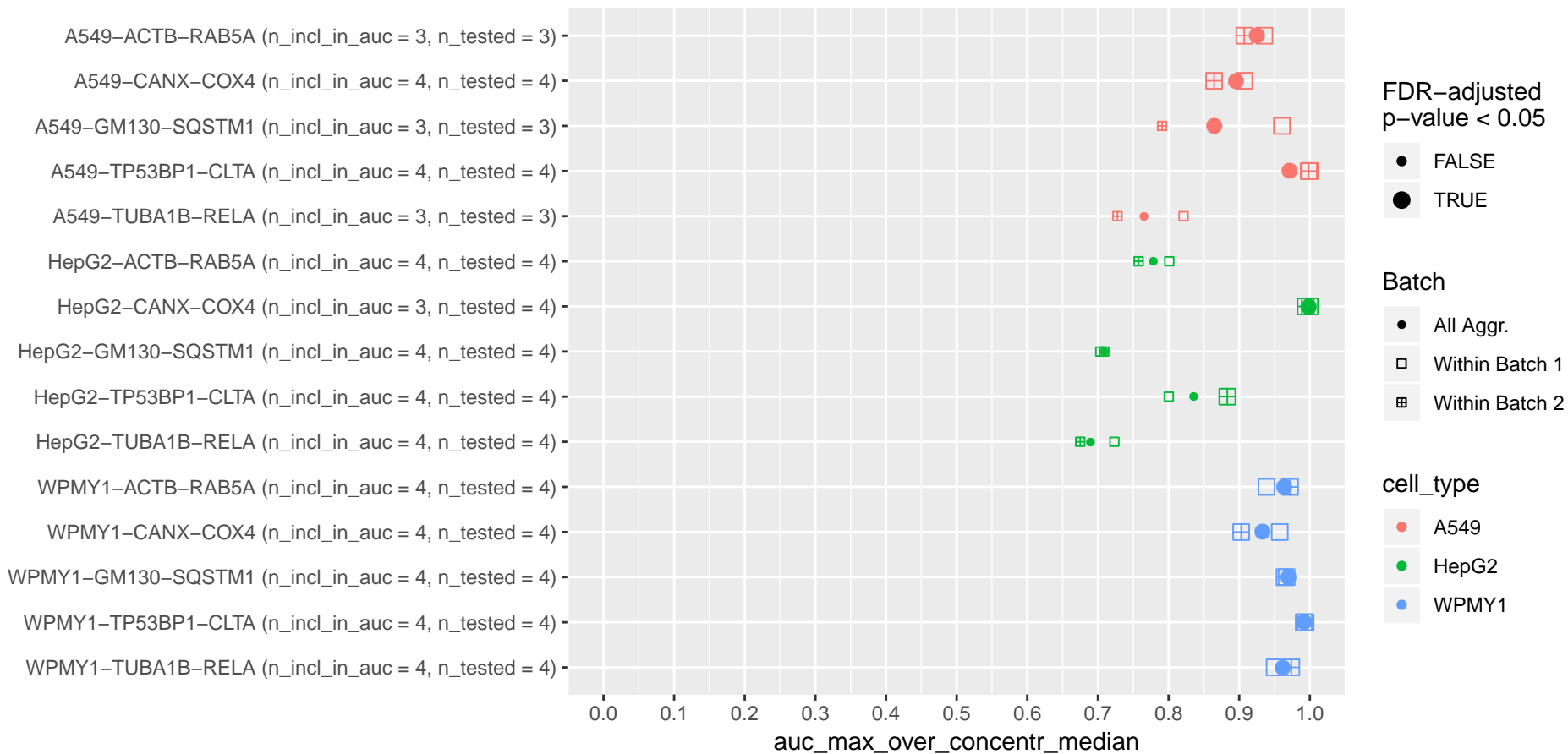
# Src family<sup>^</sup>inhibitor



# TGF beta receptor<sup>inhibitor</sup>

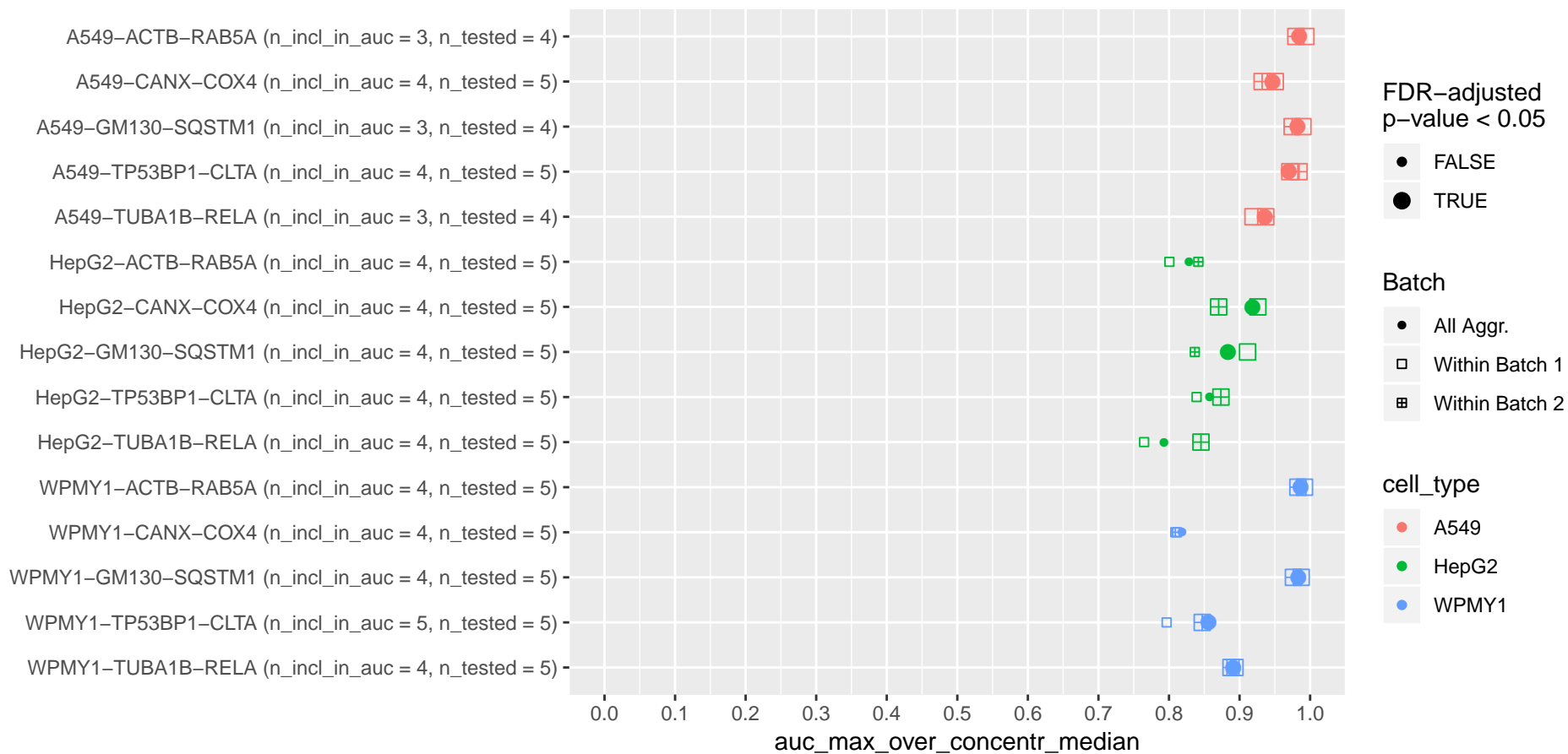


# Topoisomerase<sup>^</sup>inhibitor

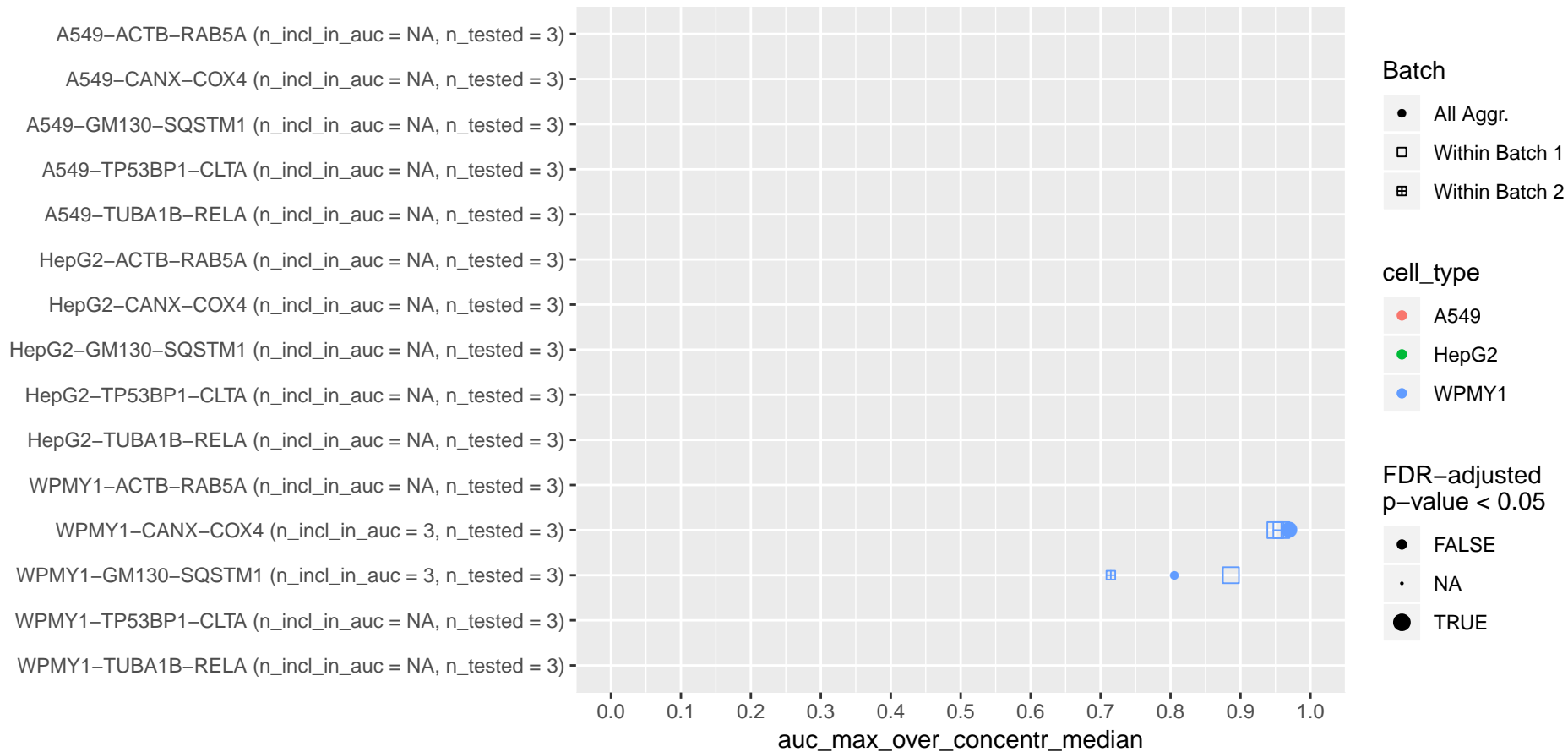




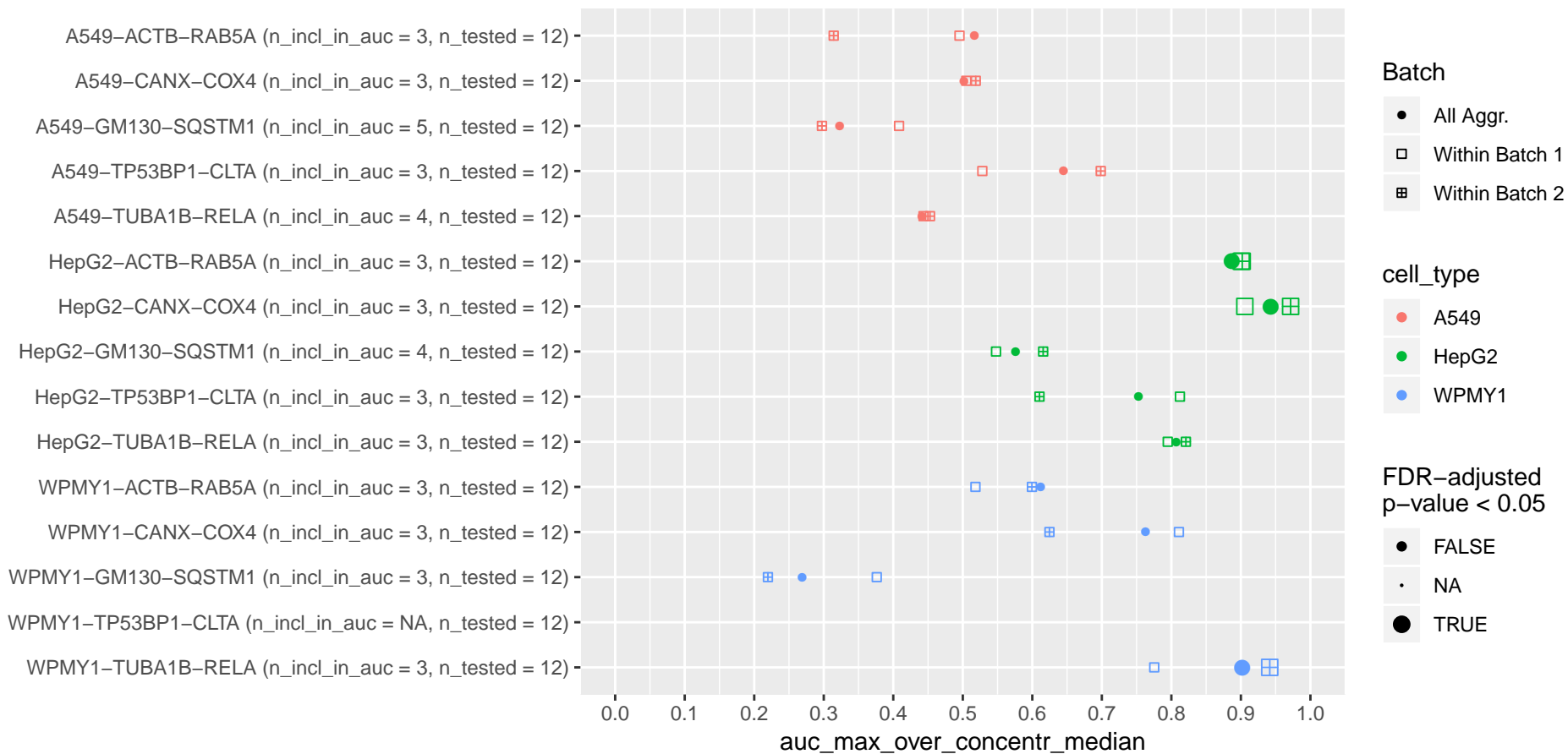
# Translation<sup>in</sup>hibitor



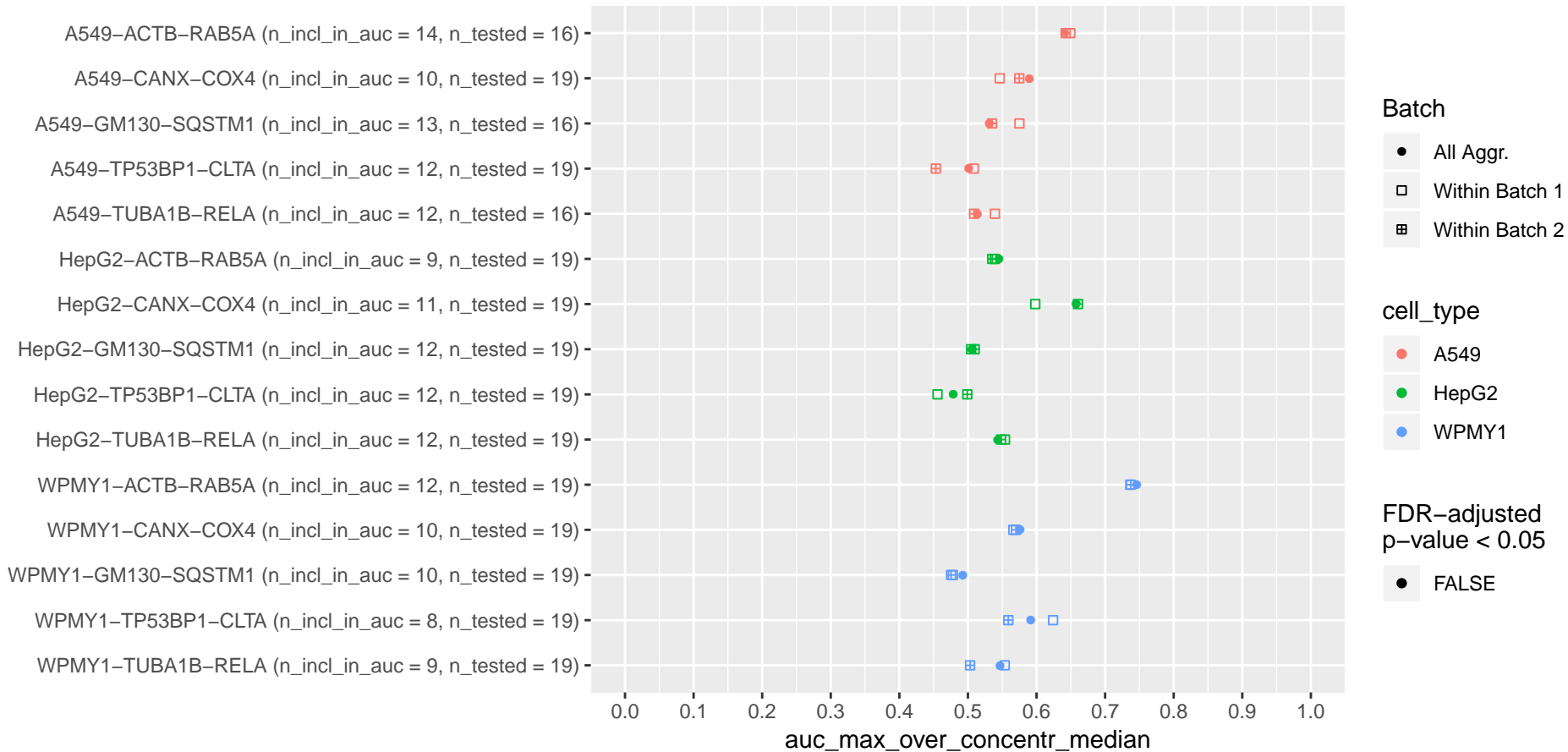
# Ubiquitin E1 ligase<sup>inhibitor</sup>



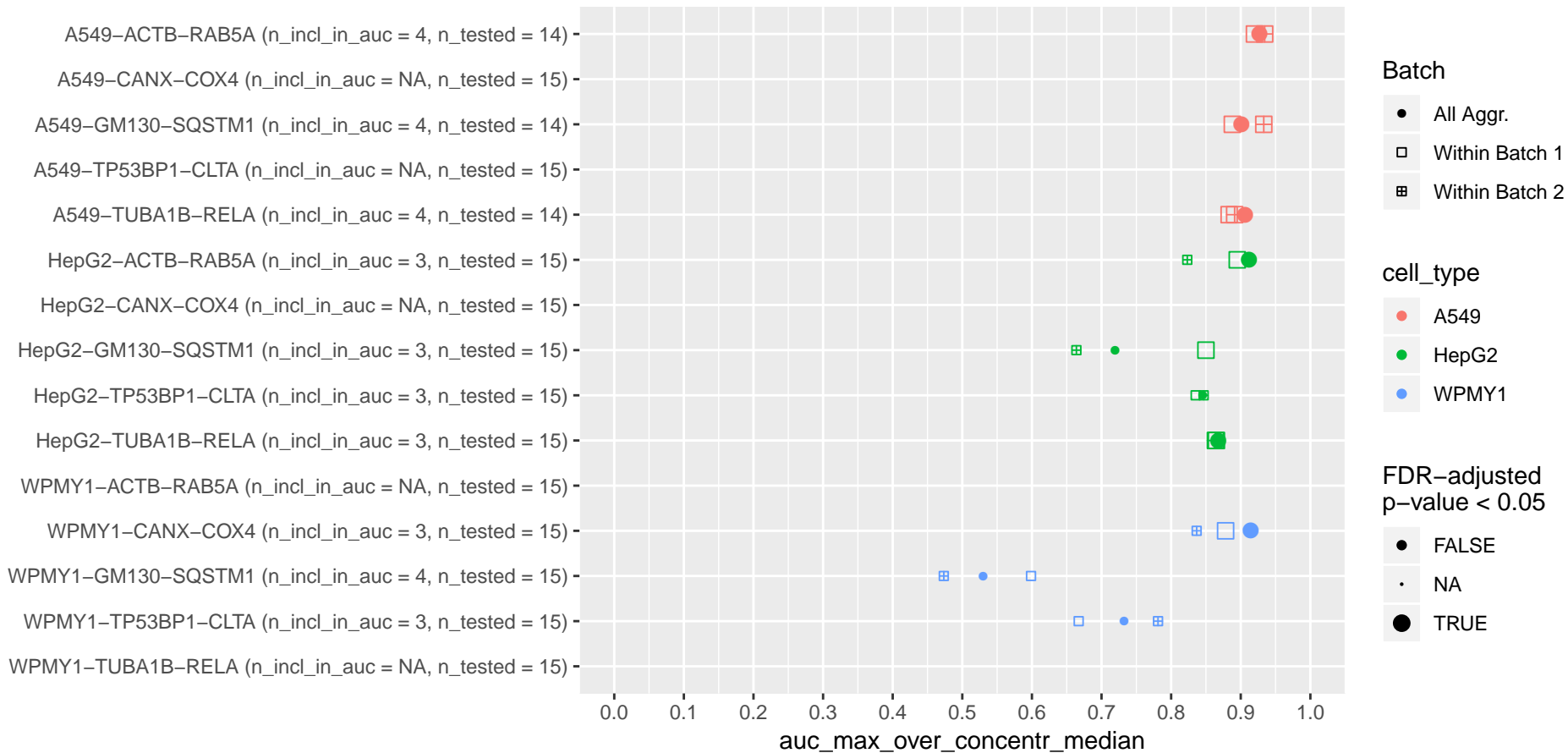
# Ubiquitin E3 ligase<sup>in</sup>hibitor



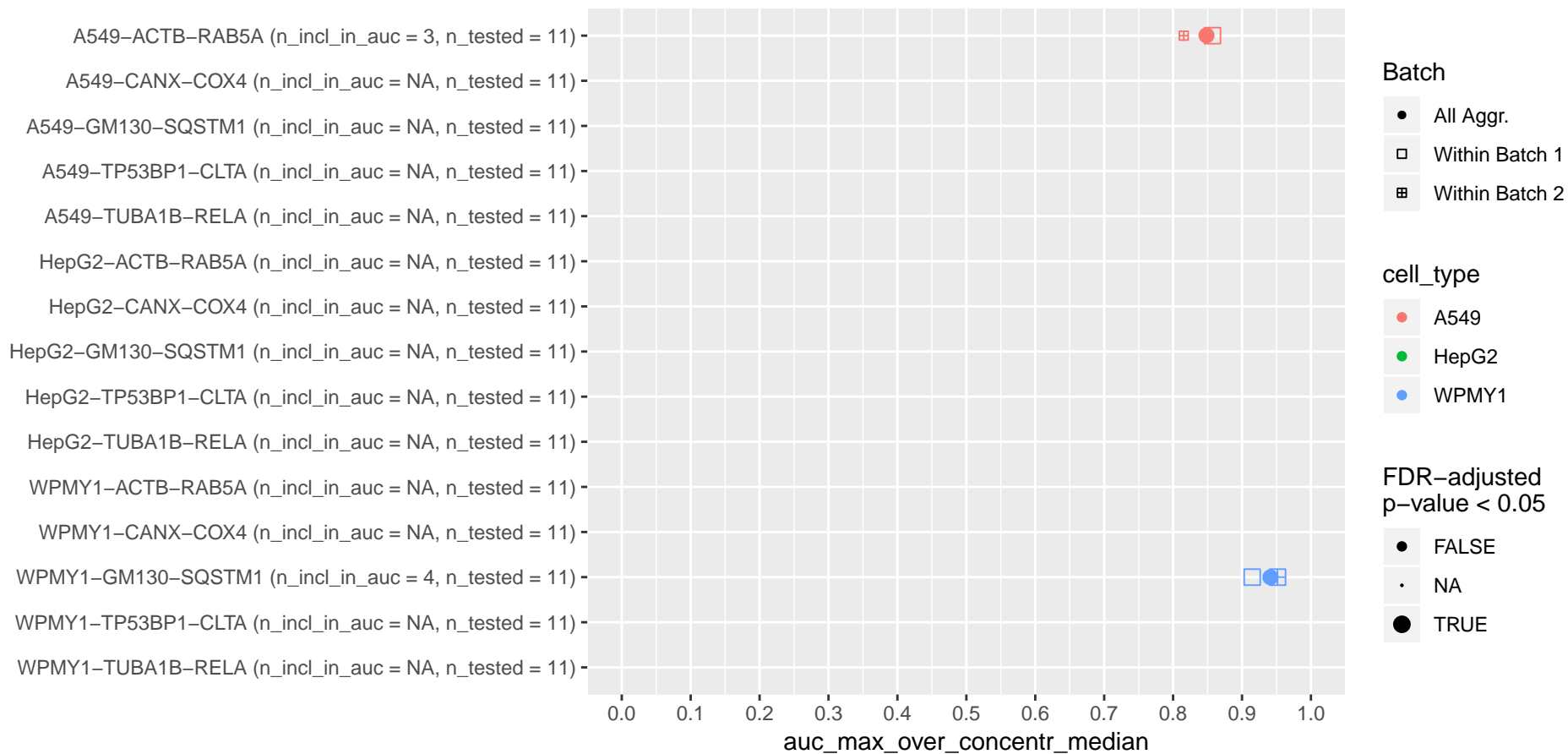
# VEGFR family^inhibitor



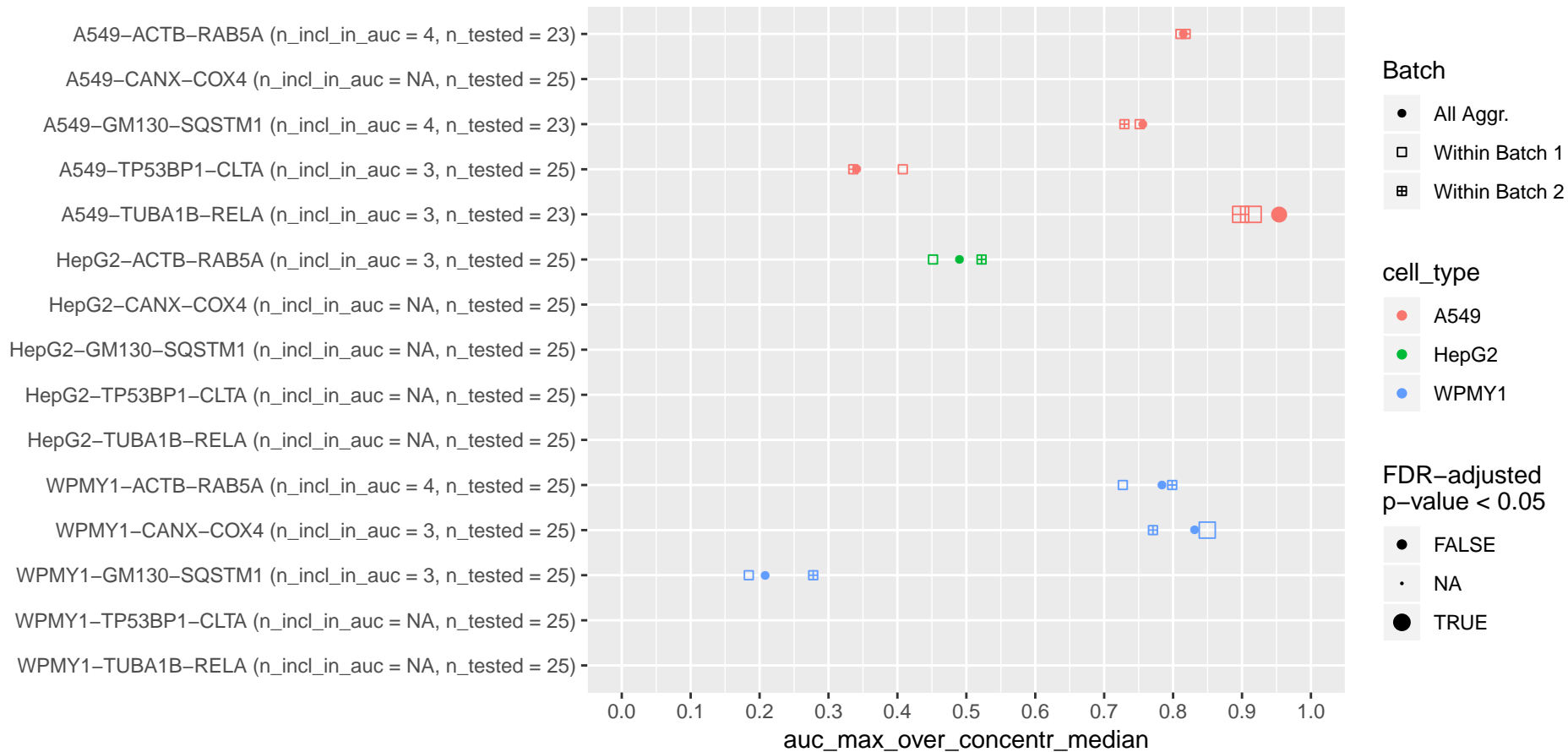
# Voltage-gated calcium channel^blocker



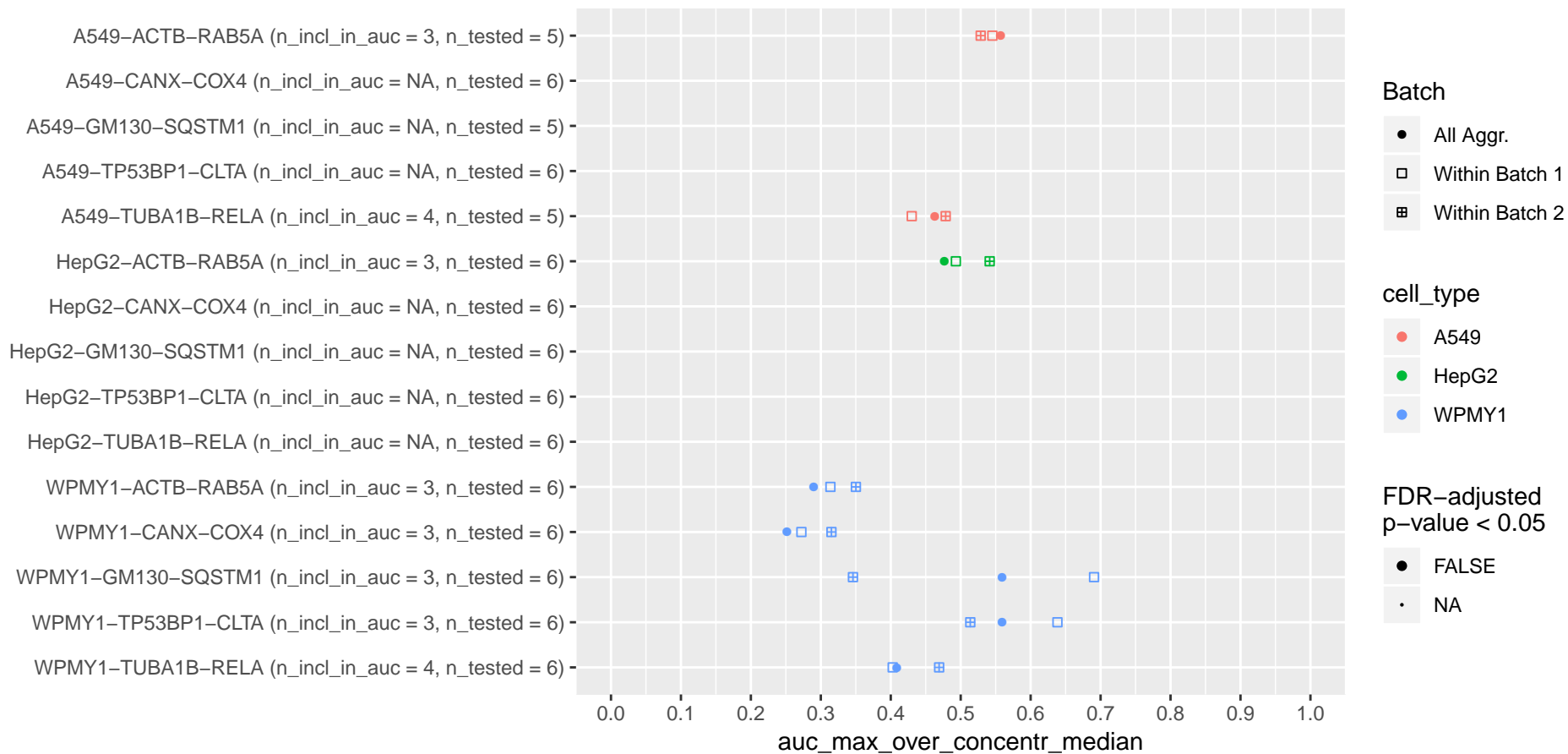
# Voltage-gated potassium channel<sup>1</sup>blocker



# Voltage-gated sodium channel^blocker

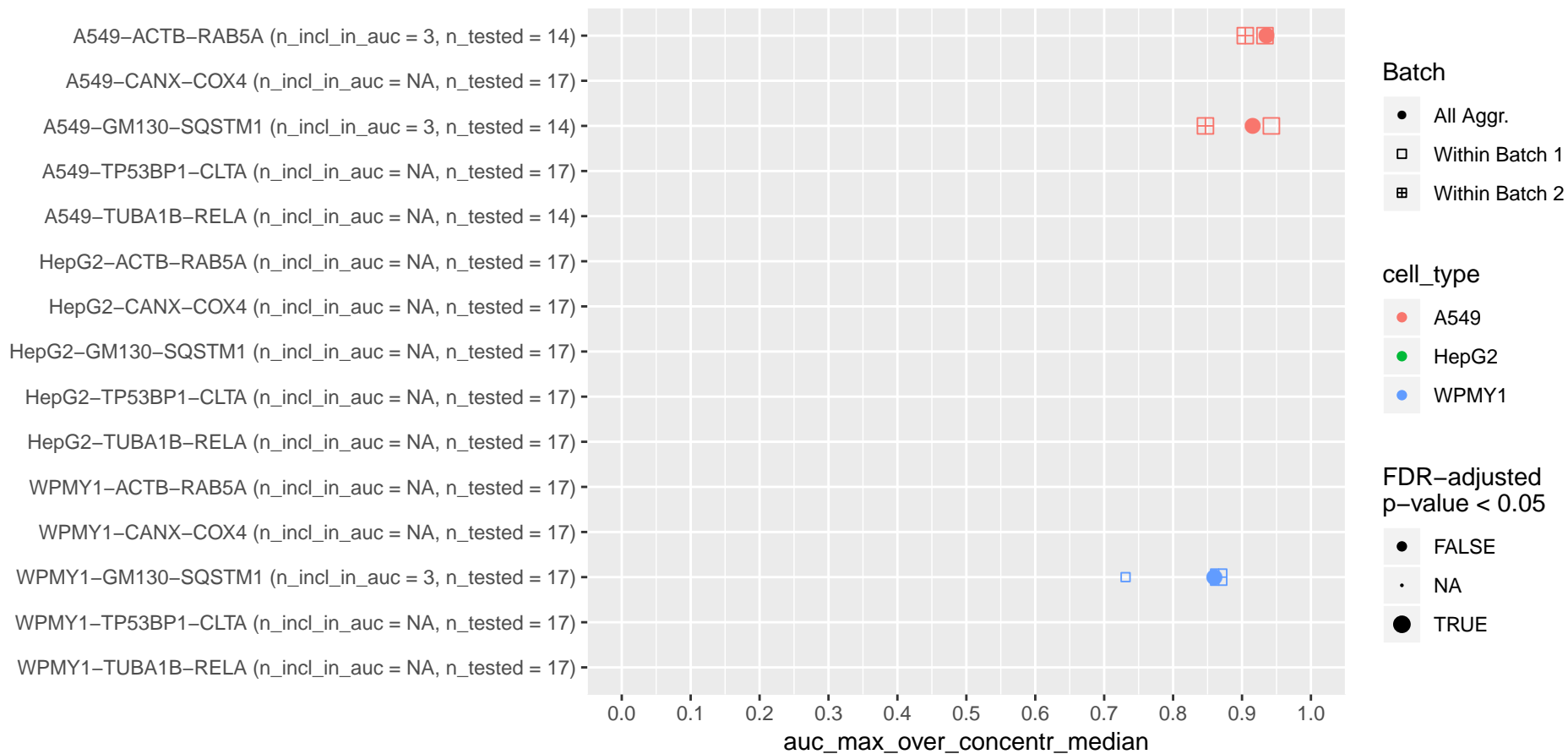


# c-Jun kinase<sup>inhibitor</sup>

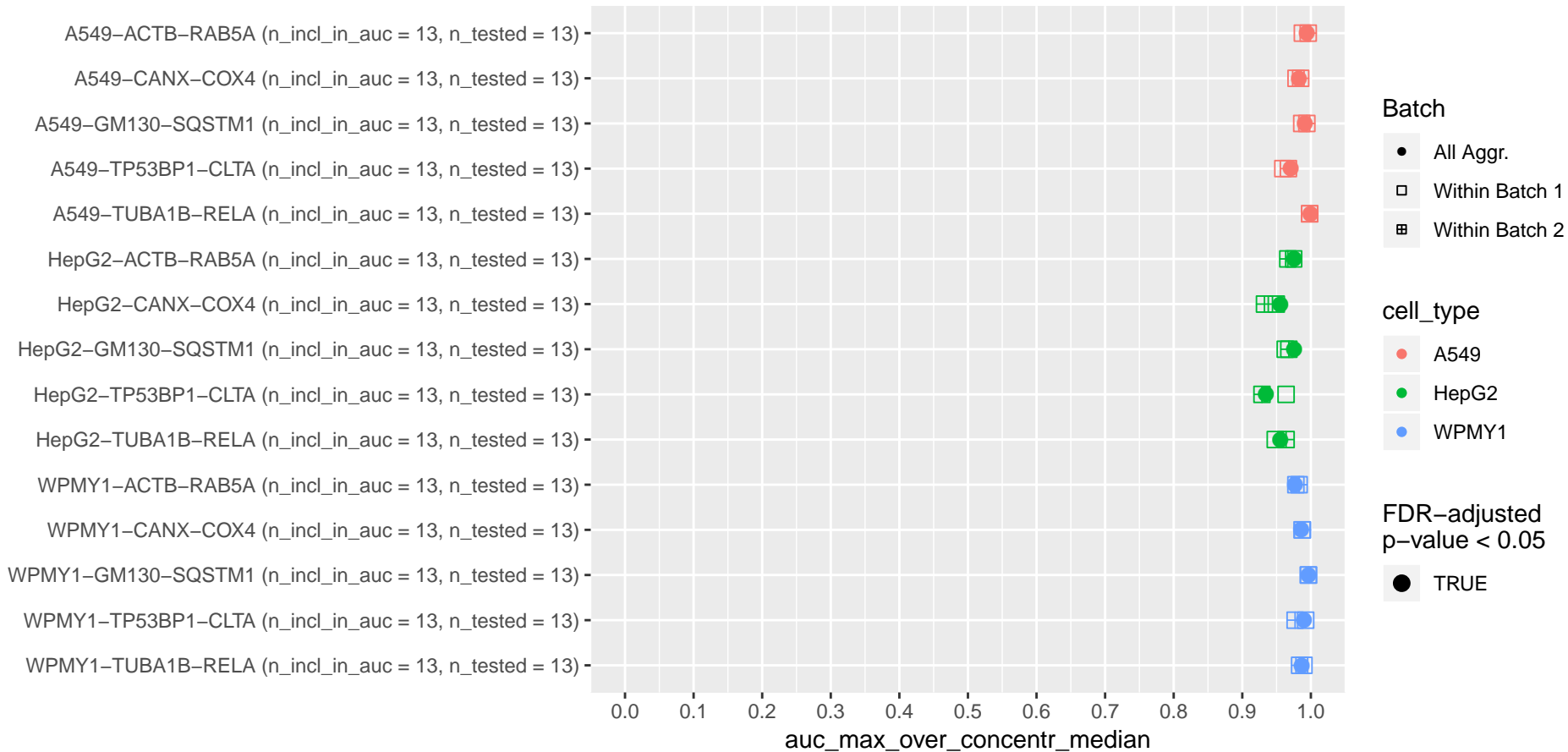




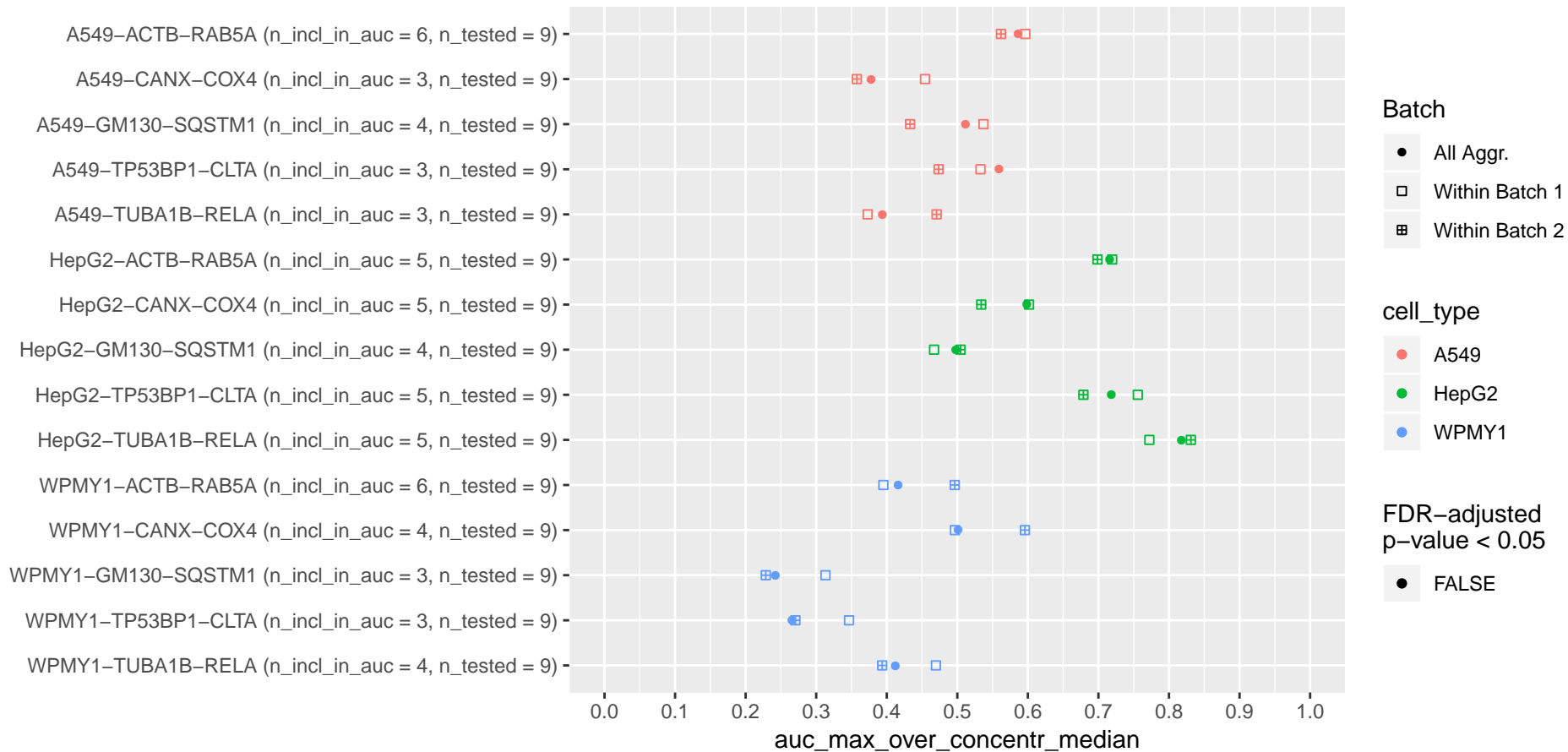
# mAChR^antagonist



# mTOR<sup>i</sup>inhibitor



# p38 MAPK<sup>inhibitor</sup>



# p90 RSK<sup>inhibitor</sup>

