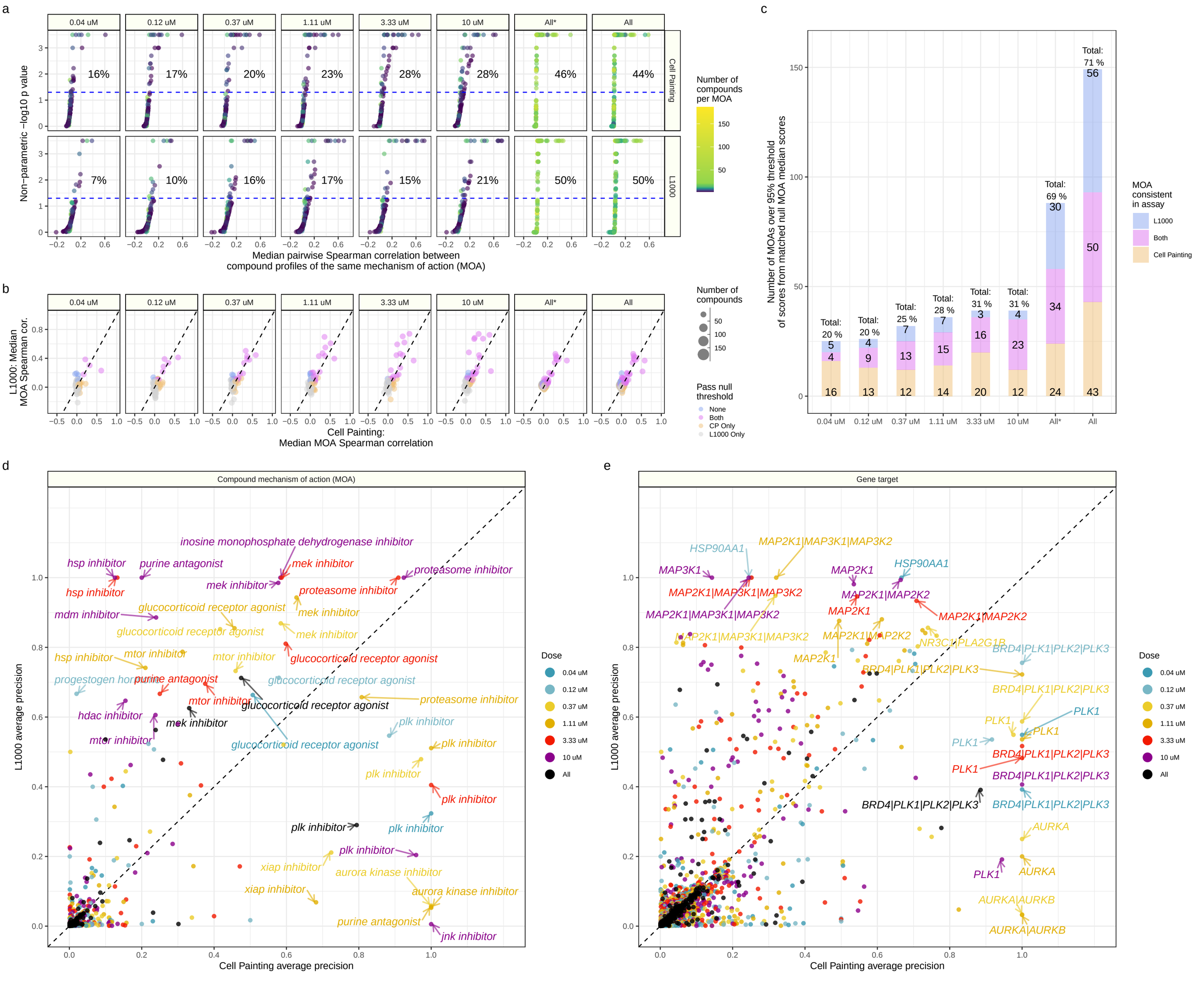
a
0.04 uM
0.12 uM
0.37 uM
1.11 uM
3.33 uM
10 uM
All*
All
Cell Painting
L1000
16%
17%
20%
23%
28%
28%
46%
44%
7%
10%
16%
17%
15%
21%
50%
50%
Non−parametric −log10 p value
Median pairwise Spearman correlation between
compound profiles of the same mechanism of action (MOA)
Number of compounds per MOA
b
L1000: Median MOA Spearman cor.
Cell Painting: Median MOA Spearman correlation
Number of compounds
Pass null threshold
None
Both
CP Only
L1000 Only
c
Number of MOAs over 95% threshold of scores from matched null MOA median scores
Total: 20 %
Total: 20 %
Total: 25 %
Total: 28 %
Total: 31 %
Total: 31 %
Total: 69 %
Total: 71 %
MOA consistent in assay
L1000
Both
Cell Painting
d
Compound mechanism of action (MOA)
L1000 average precision
Cell Painting average precision
inosine monophosphate dehydrogenase inhibitor
hsp inhibitor
purine antagonist
mek inhibitor
proteasome inhibitor
mdm inhibitor
glucocorticoid receptor agonist
mtor inhibitor
progestogen hormone
hdac inhibitor
plk inhibitor
xiap inhibitor
aurora kinase inhibitor
jnk inhibitor
Dose
0.04 uM
0.12 uM
0.37 uM
1.11 uM
3.33 uM
10 uM
All
e
Gene target
HSP90AA1
MAP2K1|MAP3K1|MAP3K2
MAP3K1
MAP2K1
MAP2K1|MAP2K2
NR3C1|PLA2G1B
BRD4|PLK1|PLK2|PLK3
PLK1
AURKA
AURKA|AURKB