Legend:
- no $V_r^{end}$
- no $V_r^{end}$, closest
- $0 < V_r^{end} < 48$ cm

$\pi^-$, $n_{matched \geq 2}$

x-axis: $(\eta^{true}-\eta^{reco})^2+(\phi^{true}-\phi^{reco})^2$

$\pi^+$, $n_{matched \geq 2}$

— no $V_r^{end}$

— no $V_r^{end}$, closest

— $0 < V_r^{end} < 48$ cm

$(\eta^{true}-\eta^{reco})^2+(\phi^{true}-\phi^{reco})^2$

p
$0 < V_r^{end} < 48$ cm

track charge