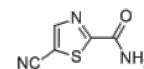


**Product Name** : 2-TCPA  
**Cat. No.** : PC-38907  
**CAS No.** : 2136639-04-6  
**Molecular Formula** : C<sub>5</sub>H<sub>3</sub>N<sub>3</sub>OS  
**Molecular Weight** : 153.159  
**Target** : Other Targets  
**Solubility** : 10 mM in DMSO



### Biological Activity

2-TCPA is a potent, specific inhibitor of **carbamoyl-phosphate synthetase**, **aspartate transcarbamoylase**, and dihydroorotase (CAD), suppresses **SARS-CoV-2** replication in Caco-2 cells with IC<sub>50</sub> of 2.36 μM.

2-TCPA efficiently inhibited RelA deamidation in Caco-2 cells expressing Nsp9.

2-TCPA increased the expression of NF-κB-responsive genes, such as IL-6, IL-8, and CCL5, in a dose-dependent manner in HEK293T cells infected with Sendai virus.

2-TCPA also greatly elevated TNFA, NFKB1A, and CCL5 expression in SARS-CoV-2-infected Calu-3 cells.

2-TCPA potently inhibited SARS-CoV-2 replication in a dose-dependent manner in NHBE.

2-TCPA inhibits SARS-CoV-2 replication in mouse models, reduced SARS-CoV-2 load in the lung, reduced viral RNA content and reduced N protein expression in both alveoli and bronchioli areas.

### References

Chao Qin, et al. *Proc Natl Acad Sci U S A*. 2022 Jun 28;119(26):e2122897119.

**Caution: Product has not been fully validated for medical applications. Lab Use Only!**

E-mail: tech@probechem.com