

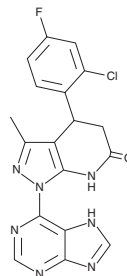
# PRODUCT INFORMATION



## TM-N1324

Item No. 37208

**CAS Registry No.:** 1144477-35-9  
**Formal Name:** 4-(2-chloro-4-fluorophenyl)-1,4,5,7-tetrahydro-3-methyl-1-(9H-purin-6-yl)-6H-pyrazolo[3,4-b]pyridin-6-one  
**Synonyms:** Compound 1324, Cpd1324  
**MF:** C<sub>18</sub>H<sub>13</sub>ClFN<sub>7</sub>O  
**FW:** 397.8  
**Purity:** ≥98%  
**Supplied as:** A solid  
**Storage:** -20°C  
**Stability:** ≥4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

TM-N1324 is supplied as a solid. A stock solution may be made by dissolving the TM-N1324 in the solvent of choice, which should be purged with an inert gas. TM-N1324 is soluble in ethanol and DMSO.

### Description

TM-N1324 is an agonist of G protein-coupled receptor 39 (GPR39).<sup>1</sup> It is selective for GPR39 over a panel of 165 GPCRs, including the growth hormone (GH) secretagogue receptor (GHS-R) and motilin receptor, at 1 μM. TM-N1324 induces inositol phosphate accumulation in HEK293 cells expressing human GPR39 (EC<sub>50</sub>s = 2 and 201 nM in the presence and absence of zinc, respectively) and cAMP accumulation in COS-7 cells expressing human GPR39 (EC<sub>50</sub> = 17 nM in the presence of zinc). It decreases ghrelin secretion and increases somatostatin secretion in isolated mouse gastric mucosa cells when used at a concentration of 1 μM. TM-N1324 (30 mg/kg) decreases food intake during the dark period and body weight in a mouse model of high-fat diet-induced obesity.<sup>2</sup>

### References

1. Frimurer, T.M., Mende, F., Graae, A.-S., *et al.* Model-based discovery of synthetic agonists for the Zn<sup>2+</sup>-sensing G-protein-coupled receptor 39 (GPR39) reveals novel biological functions. *J. Med. Chem.* **60**(3), 886-898 (2017).
2. Grunddal, K.V., Diep, T.A., Petersen, N., *et al.* Selective release of gastrointestinal hormones induced by an orally active GPR39 agonist. *Mol. Metab.* **49**, 101207 (2021).

#### WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

#### SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

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