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Phosphatidylinositol-4,5-bisphosphate 3-kinase family in GtoPdb v.2025.1

Mohib Uddin[1]

1. AstraZeneca, Sweden

Abstract

PI3K activation is one of the most important signal transduction pathways used to transmit signals from cell-surface receptors to regulate intracellular processes (cell growth, survival, proliferation and movement). PI3K catalytic (and regulatory) subunits play vital roles in normal cell function and in disease. Progress made in developing PI3K-targeted agents as potential therapeutics for treating cancer and other diseases is reviewed by Fruman *et al.* (2017) [44].

Contents

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Database links

Phosphatidylinositol-4,5-bisphosphate 3-kinase family
https://www.guidetopharmacology.org/GRAC/FamilyDisplayForward?familyId=673
Introduction to Phosphatidylinositol-4,5-bisphosphate 3-kinase family
https://www.guidetopharmacology.org/GRAC/FamilyIntroductionForward?familyId=673

Enzymes

- PI3Kα(phosphatidylinositol-4,5-bisphosphate 3-kinase catalytic subunit alpha)
  https://www.guidetopharmacology.org/GRAC/ObjectDisplayForward?objectId=2153
- PI3Kβ(phosphatidylinositol-4,5-bisphosphate 3-kinase catalytic subunit beta)
  https://www.guidetopharmacology.org/GRAC/ObjectDisplayForward?objectId=2154
- PI3Kγ(phosphatidylinositol-4,5-bisphosphate 3-kinase catalytic subunit gamma)
  https://www.guidetopharmacology.org/GRAC/ObjectDisplayForward?objectId=2156
- PI3Kδ(phosphatidylinositol-4,5-bisphosphate 3-kinase catalytic subunit delta)
  https://www.guidetopharmacology.org/GRAC/ObjectDisplayForward?objectId=2155

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