CLAIMS

[Claim1]

A process for producing butadiene, comprising:

a first step of producing butadiene by a vapor-phase catalytic oxidation reaction in the presence of a catalyst by feeding a monoolefin having 4 carbon atoms to a fluidized bed reactor; and

a second step of removing a part of the catalyst from the fluidized bed reactor while the vapor-phase catalytic oxidation reaction is proceeding, regenerating the catalyst removed from the fluidized bed reactor while the vapor-phase catalytic oxidation reaction is proceeding, and feeding the regenerated catalyst to the fluidized bed reactor while the vapor-phase catalytic oxidation reaction is proceeding,

wherein a ratio of an amount (kg/hr) of the regenerated catalyst fed to an amount (kg/hr) of the monoolefin having 4 carbon atoms fed is 0.3% or more.

[Claim2]

The process for producing butadiene according to claim 1, wherein the ratio of the amount (kg/hr) of the regenerated catalyst fed to the amount (kg/hr) of the monoolefin having 4 carbon atoms fed is 0.3 to 100%.

[Claim 3]

The process for producing butadiene according to claim 1 or 2, wherein the catalyst comprises a metal oxide comprising at least Mo, Bi, and Fe.

[Claim 4]