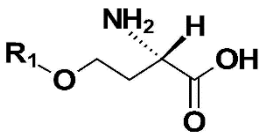
CLAIMS

1. A method of preparing L-homoserine, the method comprising:

contacting an L-homoserine derivative represented by the following Formula 1 with a solid acid catalyst, wherein the solid acid catalyst comprises -SO_4H or a combination of -SO_4H and –COOH:

<Formula 1>



in Formula 1,

R_1 is R_a-(C=O)-,

R_a is a substituted or unsubstituted alkyl group having 1 to 6 carbon atoms, ~~a substituted or unsubstituted alkenyl group having 1 to 6 carbon atoms, a substituted or unsubstituted alkynyl group having 1 to 6 carbon atoms,~~ a substituted or unsubstituted cycloalkyl group having 3 to 10 carbon atoms, a substituted or unsubstituted aryl group having 6 to 20 carbon atoms, or a substituted or unsubstituted heteroaryl group having 2 to 10 carbon atoms, and

substituents of the alkyl group, ~~the alkenyl group, the alkynyl group,~~ the cycloalkyl group, the aryl group, and the heteroaryl group are each independently halogen, a carboxyl group (-COOH), an acetyl group (-$COCH_3$), an amino group (-NH_2), a nitro group (-NO_2), a cyano group (-CN), an alkyl group having 1 to 6 carbon atoms, an aryl group having 6 to 10 carbon atoms, or a cycloalkyl group having 3 to 10 carbon atoms.

2. The method of claim 1, wherein R_1 is acetyl or succinyl.

3. The method of claim 1, wherein the contacting is contacting the L-homoserine derivative with water and the solid acid catalyst.

4. The method of claim 1, wherein the solid acid catalyst comprises a resin catalyst.

5. The method of claim 4, wherein the solid acid catalyst comprises a cation

exchange resin catalyst.

6. The method of claim 5, wherein the cation exchange resin catalyst comprises ~~one or more~~ acidic functional groups selected from -SO_4H or a combination of -SO_4H and –COOH.

7. The method of claim 5, wherein the cation exchange resin catalyst comprises a structure in which ~~one or more~~ acidic functional groups selected from -SO_4H or a combination of -SO_4H and –COOH are linked to a polystyrene-divinylbenzene copolymer.

8. The method of claim 1, wherein the contacting is carried out in a resin tower comprising the solid acid catalyst.

9. The method of claim 1, wherein a content of the solid acid catalyst is 0.1 equivalent to 10 equivalents with respect to 1 equivalent of the L-homoserine derivative.

10. The method of claim 1, wherein an aqueous solution comprising the solid acid catalyst is at pH of 1 to 5.

11. The method of claim 1, wherein the contacting is carried out at a temperature of 20°C to 150°C.

12. The method of claim 1, wherein the contacting is carried out for 0.1 hr to 20 hr.

13. The method of claim 1, wherein the contacting comprises:
supplying the L-homoserine derivative;
producing L-homoserine by contacting the L-homoserine derivative with the solid acid catalyst; and
discharging the L-homoserine.

14. The method of claim 13, wherein the supplying of the L-homoserine and the

discharging of L-homoserine are continuously carried out.

15. The method of claim 1, the method further comprising:
collecting the L-homoserine.