Claims

1. A method for producing renal progenitor cells into which pluripotent stem cells are induced to differentiate, the method consisting of the steps of:
(i) culturing the pluripotent stem cells under conditions that induce differentiation into renal progenitor cells; and
(ii) sorting a cell population from the cells obtained at step (i), by using a combination of cell surface markers selected from following:

(a) CD9(-)、CD140a(+)、CD140b(+) and CD271(+)；

(b) CD9(-)、CD165(+)、CD140b(+) and CD271(+)；

(c) CD9(-)、CD140a(+)、CD106(+) and CD271(+)；

(d) CD9(-)、CD140a(+)、CD165(+) and CD271(+)；

(e) CD55(-)、CD140a(+)、CD140b(+) and CD271(+)；

(f) CD326(-)、CD140a(+)、CD140b(+) and CD271(+)；

(g) CD9(-)、CD140a(+) and CD271(+)；

(h) CD9(-)、CD140b(+) and CD271(+)；or

(i) CD140a(+)、CD140b(+) and CD271(+).

2. The method according to claim, wherein at step (ii), CD9(-), CD140a(+), CD140b(+) and CD271(+) are used as the cell surface markers.

3. The method according to claim 1, wherein at step (ii), CD9(-), CD140a(+), CD165(+) and CD271(+) are used as the cell surface markers.

4. The method according to any of claims 1 to 3, wherein the pluripotent stem cells are induced pluripotent stem (iPS) cells.

5. The method according to any of claims 1 to 4, wherein the pluripotent stem cells are human iPS cells.

6. A method for sorting a cell population from a renal progenitor cell-containing cell population by using a combination of cell surface markers selected from following:

(a) CD9(-)、CD140a(+)、CD140b(+) and CD271(+)；

(b) CD9(-)、CD165(+)、CD140b(+) and CD271(+)；

(c) CD9(-)、CD140a(+)、CD106(+) and CD271(+)；

(d) CD9(-)、CD140a(+)、CD165(+) and CD271(+)；

(e) CD55(-)、CD140a(+)、CD140b(+) and CD271(+)；

(f) CD326(-)、CD140a(+)、CD140b(+) and CD271(+)；

(g) CD9(-)、CD140a(+) and CD271(+)；

(h) CD9(-)、CD140b(+) and CD271(+)；or

(i) CD140a(+)、CD140b(+) and CD271(+).

7. The method according to claim 6, wherein CD9(-), CD140a(+), CD140b(+) and CD271(+) are used as the cell surface markers.

8. The method according to claim 6, wherein CD9(-), CD140a(+), CD165(+) and CD271(+) are used as the cell surface markers.

9. The method according to any of claims 6 to 8, wherein the renal progenitor cells are renal progenitor cells into which pluripotent stem cells are induced to differentiate.

10. The method according to claim 9, wherein the pluripotent stem cells are induced pluripotent stem (iPS) cells.

11. The method according to claim 9, wherein the pluripotent stem cells are human iPS cells.