CLAIMS

1. A method of transducing T cells, comprising

thawing frozen peripheral blood mononuclear cells (PBMC),

resting the thawed PBMC for 4 to 6 hours,

activating the T cells in the rested PBMC with an anti-CD3 antibody and an anti-CD28 antibody,

transducing the activated T cells with a viral vector, wherein the viral vector comprises a retroviral vector expressing a T cell receptor (TCR),

expanding the transduced T cells in the presence of interleukin 7 (IL-7) and interleukin 15 (IL-15), and

obtaining the expanded T cells.

2. The method of claim 1, wherein the activating step comprises immobilizing the T cells in the rested PBMC with the anti-CD3 antibody and the anti-CD28 antibody on a solid phase support.

3. The method of claim 2, wherein the fold expansion of obtained T cells with a resting time of 4 to 6 hours is at least 1.5 fold more than that of obtained T cells prepared under identical conditions but with a resting time of 16 to 20 hours.

4. The method of anyone of claims 1 – 3, wherein the concentration of IL-7 in expansion is from 1 ng/ml to 100 ng/ml and the concentration of IL-15 in expansion is from 5 ng/ml to 500 ng/ml.

5. The method of anyone of claims 1 – 4 wherein the resting is carried out in the presence of interleukin 7 (IL-7) and/or interleukin 15 (IL-15).

6. The method of anyone of claims 1 – 5, wherein the activation is carried out within a period of from 6 hours to 72 hours.

7. The method of anyone of claims 1 - 6, wherein the transducing is carried out within a period of time from 1 hour to 72 hours.

8. The method of anyone of claims 1 – 7, wherein the transducing is carried out in the presence of at least one cytokine.

9. The method of anyone of claims 1 – 8, wherein the thawing, the resting, the activating, the transducing, the expanding, and the obtaining are performed in a closed system.

10. The method of any one of claims 1- 9 wherein the activating is performed for no more than 1 day.

11. The method of anyone of claims 1 – 10, wherein the number of obtained expanded T cells is at least 1 x 10^9 cells.

12. The method of anyone of claims 1 – 11, wherein the expanding is performed for 3 to 9 days.

13. The method of claim 5, wherein the resting is carried out in the presence of IL-7.

14. The method of claim 5, wherein the resting is carried out in the presence of IL-15.

15. The method of claim 5, wherein the resting is carried out in the presence of IL-7 and IL-15.