

# Cryopreserved peripheral blood stem cell products for Multiple myeloma patients

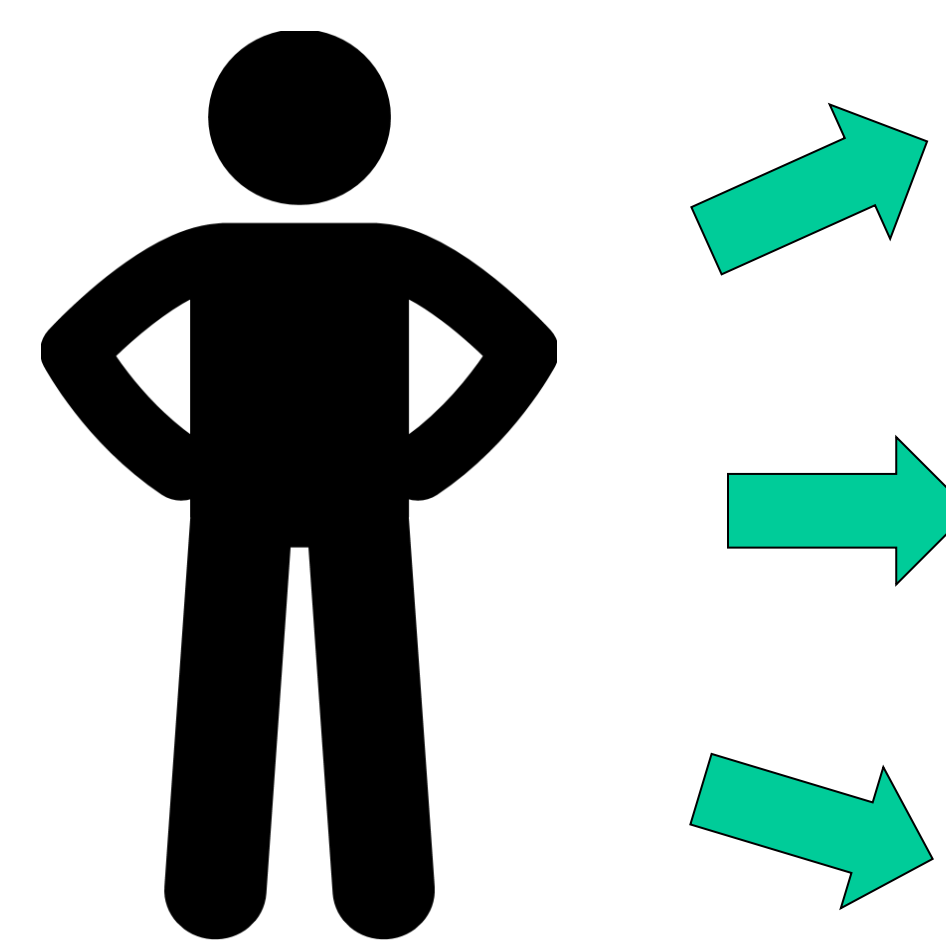
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## Background

- The high-dose therapy followed by PBSC transplantation is the standard treatment for multiple myeloma patients.
- Tandem or double autologous PBSC transplantation is usually performed for myeloma patients in less than six months.
- It is associated with better outcomes compared to a single transplant.
- It is important to collect enough PBSC to ensure availability to perform tandem transplantation and save some PBSCs in case of relapse.

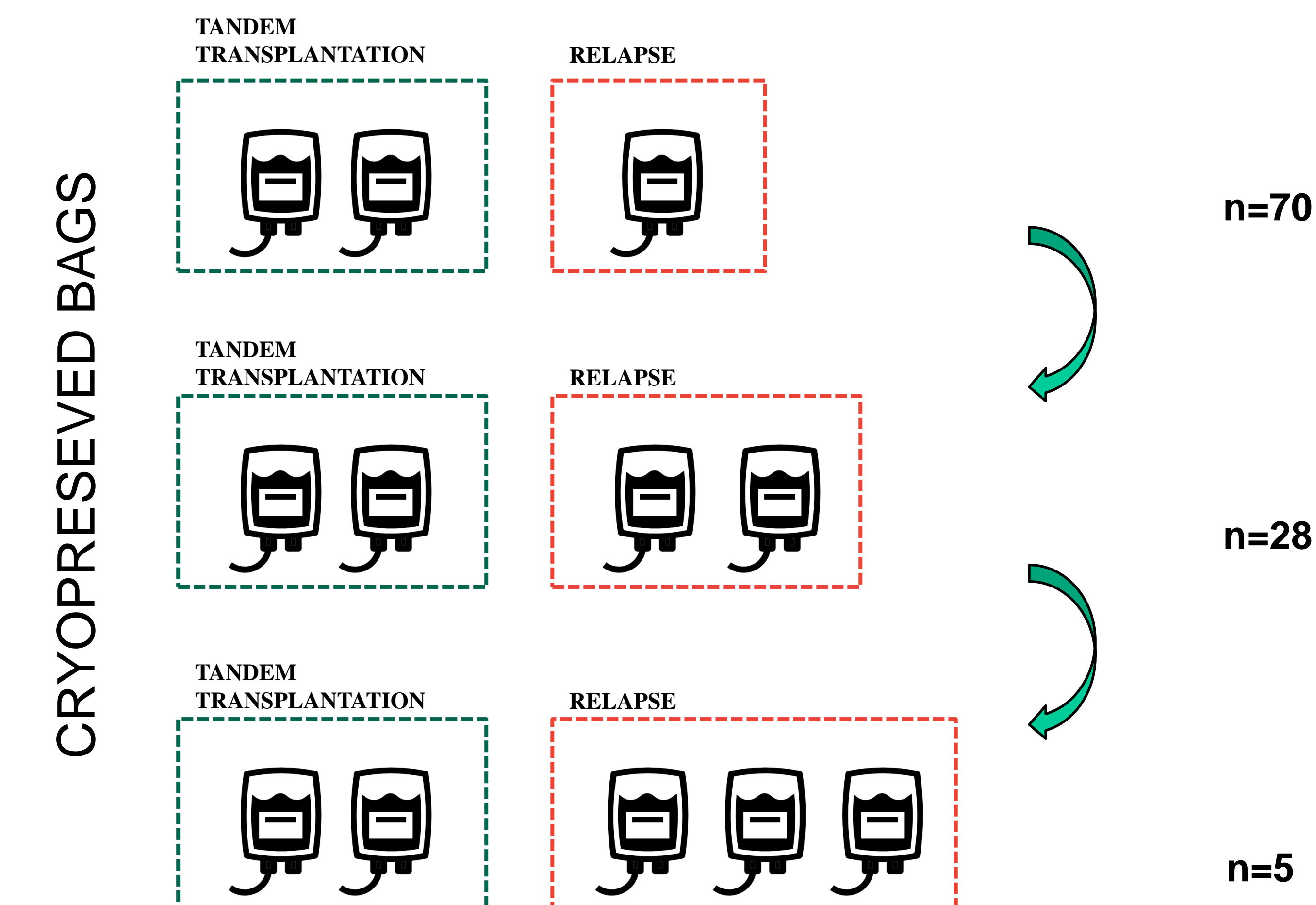
## Results



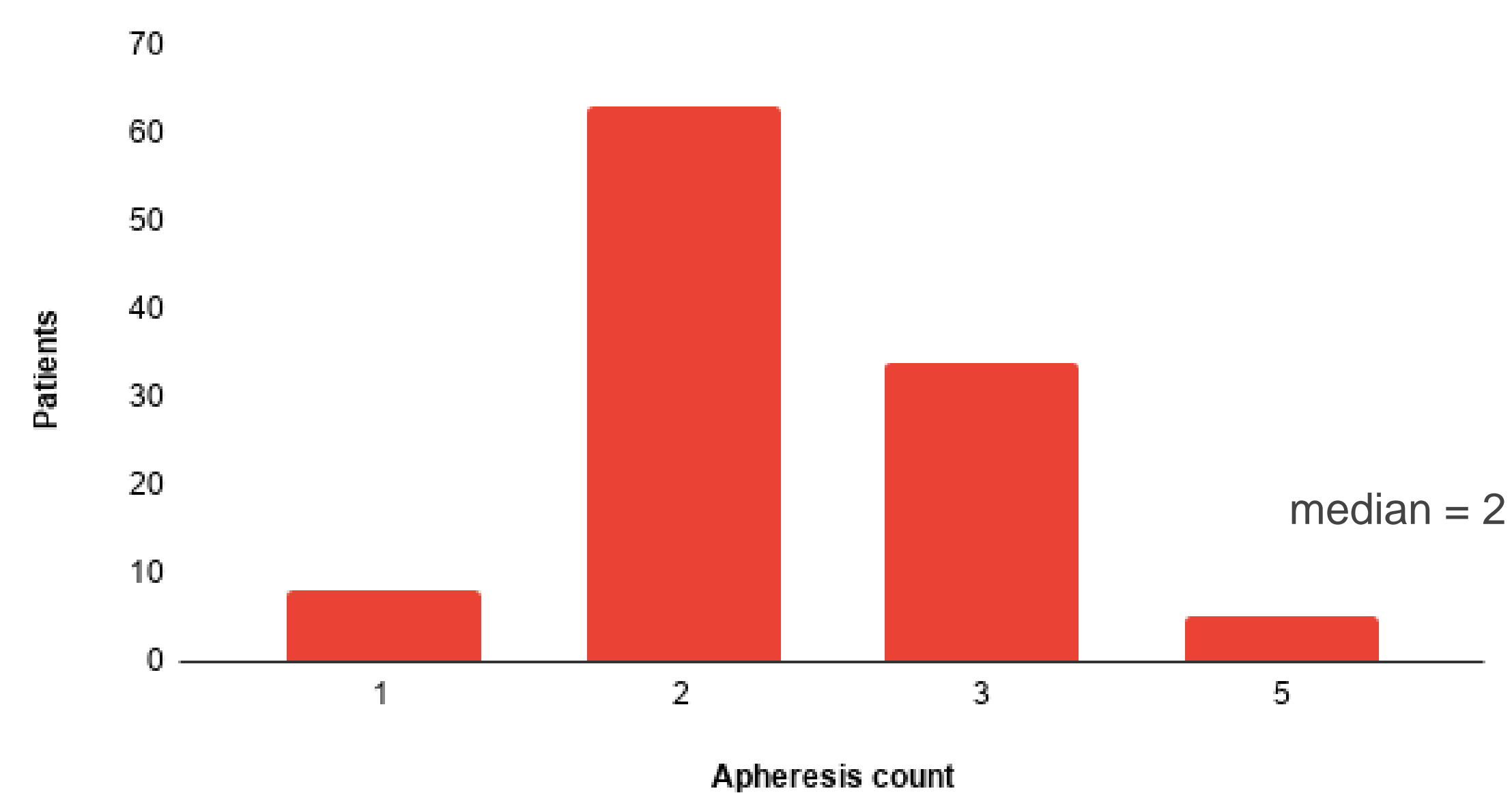
TOTAL 110  
MULTIPLE MYELOMA PATIENTS  
2015-2020.06

20 TANDEM  
TRANSPLANTATIONS

13 TRANSPLANTATIONS  
AFTER RELAPSE

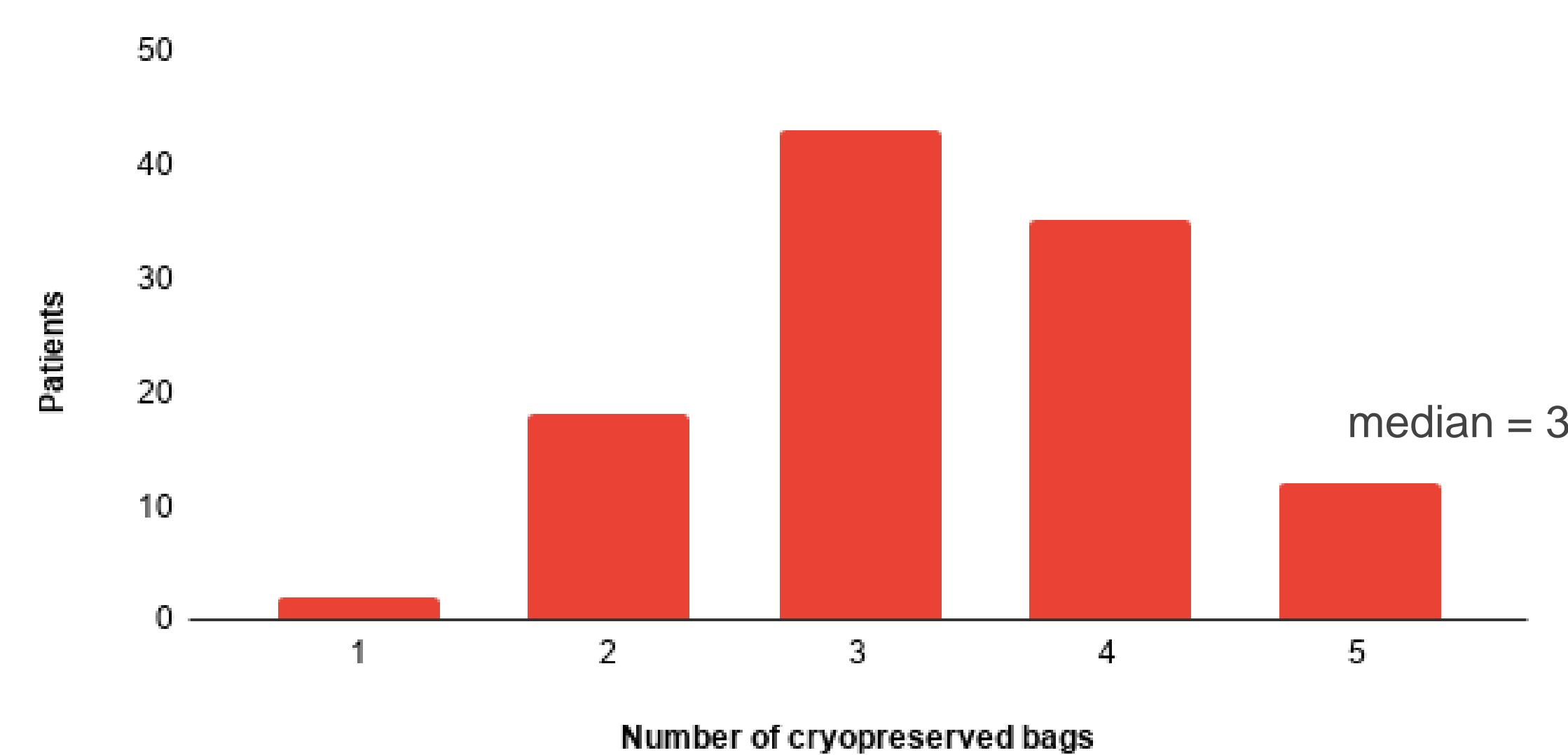


Apheresis per one patient



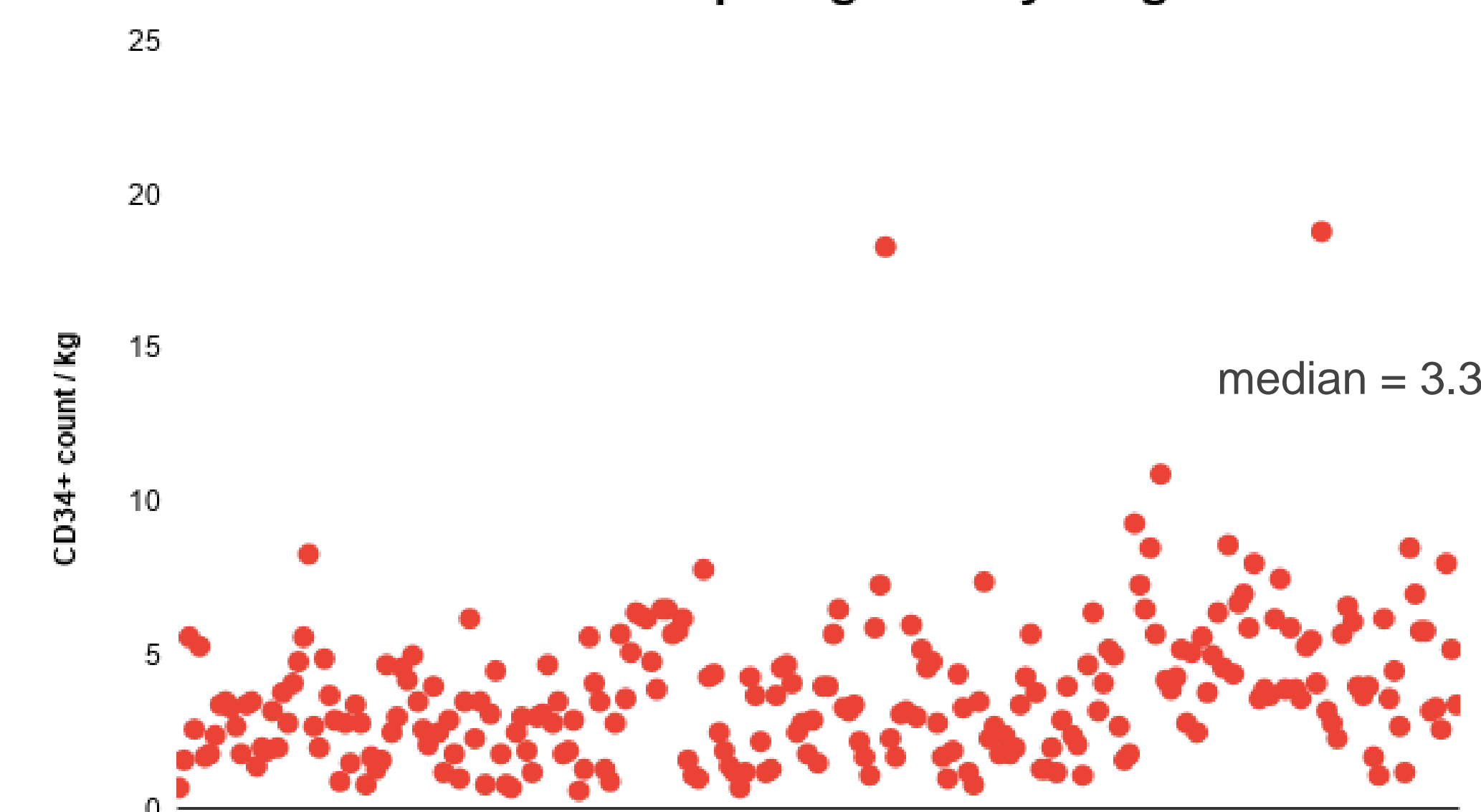
The median of 2 aphereses were done for one patient (range from 1 to 4). One apheresis was done for 8 patients (7.3%), 2 aphereses for 63 patients (57.3%), 3 aphereses for 34 patients (30.9%), 4 aphereses for 5 patients (4.5%).

Number of cryopreserved bags after one cycle of stimulation



After one cycle of stimulation the median of 3 bags of cryopreserved cells were prepared per patient, ranging from 1 to 5. Only 1 bag was prepared for 2 patients (1.8%), 2 bags were prepared for 18 patients (16.4%), 3 bags were prepared for 43 patients (39.1%), 4 bags were prepared for 35 patients (31.8%), 5 bags were prepared for 12 patients (10.9%).

CD34+ count per kg of body weight



The median of 3.3 CD34+ cells were harvested per kilogram of body weight (range from 0.6 to 38.0) in one bag for cryopreservation

## Conclusions

- PBSC collected at Kauno Klinikos, were sufficient for 70 (63.6%) patients to undergo tandem transplantation and have supplies for future use in case of relapse.
- PBSCs collected to supply 2 transplantations, were used for one transplantation and second bag was kept in case of relapse.

## Key words

Multiple myeloma, PBSC, auto-sct, cryopreservation