

RCH - Platelet Transfusion Indications

Prophylactic	
Platelet threshold	Clinical Indication
$< 10 \times 10^9/L$	<i>Platelet transfusion indicated</i>
$< 20 \times 10^9/L$ and Oncology patient with risk factors	Mucositis
	Fever
	Infection
	DIC
	APML
	Minor bleeding
$< 50 \times 10^9/L$ and High risk oncology	Brain tumour
	Bladder tumour
$< 75 - 100 \times 10^9/L$ and ECLS	<i>Platelet transfusion often indicated</i>

Therapeutic	
Platelet threshold	Clinical Indication
$< 30 \times 10^9/L$	Minimal bleeding
$< 50 \times 10^9/L$	Moderate bleeding
$< 75 \times 10^9/L$	Severe bleeding
$< 100 \times 10^9/L$	ICH or retinal haemorrhage
	Post cardiopulmonary bypass

Pre-procedure	
Platelet threshold	Clinical Indication
$< 20 \times 10^9/L$	IM injection
	CVC insertion (non-tunnelled)
$30 \times 10^9/L$	NG insertion
	LP (surveillance)
$50 \times 10^9/L$	LP (initial diagnostic for malignancy)
	CVC insertion (tunnelled)
	Major surgery
$100 \times 10^9/L$	High risk surgery (e.g., neurosurgery or ophthalmology)

Neonatal platelet transfusion	
Platelet threshold	Clinical Indication
$< 25 \times 10^9/L$	<i>Platelet transfusion indicated</i>
$< 50 \times 10^9/L$	Bleeding
	Coagulopathy (including DIC)
	Surgery
	LP
	NAIT
$< 100 \times 10^9/L$	Major bleeding (e.g., ICH)
	High risk surgery (e.g., neuro, ophthalmology or cardiac)

Platelet transfusion are not indicated for:

- Immune mediated thrombocytopenia (e.g., ITP, HIT, TTP/HUS)
- Bone marrow aspirate or trephine biopsy
- Peripheral IV insertion