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SUPPLEMENTAL DATA

Peripheral blood nucleated red blood cells predict short-term mortality and clinical outcomes in critically ill adults: A systematic review and meta-analysis

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File S1. Search strategy

The search strategy (Pubmed)

Search number	Query	Results
1	Erythroblasts[MeSH Terms]	4295
2	"Erythroblast"[Title/Abstract] OR "erythroblast kinetics"[Title/Abstract] OR "erythroblast proliferation"[Title/Abstract] OR "erythroblastic cell"[Title/Abstract] OR "Erythroblasts"[Title/Abstract] OR "Normoblast*"[Title/Abstract] OR "NRBCs"[Title/Abstract] OR "Nucleated Erythrocyte*"[Title/Abstract] OR "Nucleated red blood cell*"[Title/Abstract] OR "Proerythroblast*"[Title/Abstract] OR "Pronormoblast*"[Title/Abstract]	7105
3	"Critical Illness" OR "Intensive Care Units" OR "Sepsis" OR "Respiratory Distress Syndrome" OR "Pancreatitis" OR "Acute Kidney Injury" OR "Acute Coronary Syndrome" OR "Myocardial Infarction" OR "Liver Failure" OR "Shock" OR "Disseminated Intravascular Coagulation" OR "Heat Stroke" OR "Multiple Organ Failure"[MeSH Terms]	1172341
4	"abdominal sepsis"[Title/Abstract] OR "Acute Coronary Syndrome"[Title/Abstract] OR "Acute Edematous Pancreatitides"[Title/Abstract] OR "Acute Edematous Pancreatitis"[Title/Abstract] OR "Acute Kidney Failure*"[Title/Abstract] OR "Acute Kidney Injur*"[Title/Abstract] OR "Acute Kidney Insufficienc*"[Title/Abstract] OR "Acute Pancreatiti*"[Title/Abstract] OR "acute renal failure*"[Title/Abstract] OR "Acute Renal Injur*"[Title/Abstract] OR "acute renal insufficienc*"[Title/Abstract] OR "Acute Respiratory Distress Syndrome"[Title/Abstract] OR "Adult Respiratory Distress Syndrome"[Title/Abstract] OR "Blood Poisoning*"[Title/Abstract] OR "Bloodstream Infection*"[Title/Abstract] OR "breathing distress syndrome"[Title/Abstract] OR "cardiac infarct*"[Title/Abstract] OR "cardial infarct"[Title/Abstract] OR "cardiovascular collapse"[Title/Abstract] OR "Cardiovascular Stroke*"[Title/Abstract] OR "circulation shock"[Title/Abstract] OR "circulatory collapse"[Title/Abstract] OR "Circulatory Failure"[Title/Abstract] OR "circulatory shock"[Title/Abstract] OR "close attention unit"[Title/Abstract] OR "combined medical and surgical ICU"[Title/Abstract] OR "combined surgical and medical ICU"[Title/Abstract] OR "Consumption Coagulopathies"[Title/Abstract] OR "consumption coagulopathy"[Title/Abstract] OR "consumptive coagulopathy"[Title/Abstract] OR "consumptive thrombohaemorrhagic disorder"[Title/Abstract] OR "consumptive thrombohemorrhagic disorder"[Title/Abstract] OR "critical care unit"[Title/Abstract] OR "critical illness*"[Title/Abstract] OR "Critically Ill"[Title/Abstract] OR "DIC syndrome"[Title/Abstract] OR "diffuse intravasal coagulation"[Title/Abstract] OR "diffuse intravascular blood coagulation"[Title/Abstract] OR "diffuse intravascular clotting"[Title/Abstract] OR "diffuse intravascular	110947

coagulation"[Title/Abstract] OR "diffuse intravascular coagulopathy"[Title/Abstract] OR "disseminated fibrin thromboembolism"[Title/Abstract] OR "disseminated intravasal blood coagulation"[Title/Abstract] OR "disseminated intravasal clotting"[Title/Abstract] OR "disseminated intravasal coagulation"[Title/Abstract] OR "disseminated intravasal coagulopathia"[Title/Abstract] OR "disseminated intravasal coagulopathy"[Title/Abstract] OR "disseminated intravasal thromboembolism"[Title/Abstract] OR "disseminated intravascular blood clotting"[Title/Abstract] OR "disseminated intravascular blood coagulation"[Title/Abstract] OR "disseminated intravascular clotting"[Title/Abstract] OR "Disseminated Intravascular Coagulation*"[Title/Abstract] OR "disseminated intravascular coagulopathy"[Title/Abstract] OR "disseminated intravascular thromboembolism"[Title/Abstract] OR "focal sepsis"[Title/Abstract] OR "general ICU"[Title/Abstract] OR "GICU*"[Title/Abstract] OR "Heart Attack*"[Title/Abstract] OR "heart infarct*"[Title/Abstract] OR "heart micro infarction"[Title/Abstract] OR "heart muscle infarction"[Title/Abstract] OR "Heat Stroke*"[Title/Abstract] OR "Heatstroke*"[Title/Abstract] OR "Hepatic Failure"[Title/Abstract] OR "hepatic insufficiency"[Title/Abstract] OR "hereditary pancreatitis"[Title/Abstract] OR "Human ARDS"[Title/Abstract] OR "Hypovolemic Shock"[Title/Abstract] OR "ICU Intensive Care Units"[Title/Abstract] OR "incremental shock"[Title/Abstract] OR "intensive care department"[Title/Abstract] OR "Intensive Care Unit*"[Title/Abstract] OR "intensive therapy unit"[Title/Abstract] OR "intensive treatment unit"[Title/Abstract] OR "intraabdominal sepsis"[Title/Abstract] OR "intravasal agglutination"[Title/Abstract] OR "intravasal blood clotting"[Title/Abstract] OR "intravasal clotting"[Title/Abstract] OR "intravascular blood clotting"[Title/Abstract] OR "intravascular clotting"[Title/Abstract] OR "intravascular coagulation"[Title/Abstract] OR "intravascular coagulopathy"[Title/Abstract] OR "intravascular diffuse coagulation"[Title/Abstract] OR "intravascular disseminated blood coagulation"[Title/Abstract] OR "intravascular disseminated clotting"[Title/Abstract] OR "Intravascular Disseminated Coagulation*"[Title/Abstract] OR "intravascular disseminated coagulopathy"[Title/Abstract] OR "intravenous coagulation"[Title/Abstract] OR "kidney acute failure"[Title/Abstract] OR "Liver Failure"[Title/Abstract] OR "liver insufficiency"[Title/Abstract] OR "lung distress syndrome"[Title/Abstract] OR "massive intravasal coagulopathy"[Title/Abstract] OR "medical surgery ICU"[Title/Abstract] OR "medical surgical ICU*"[Title/Abstract] OR "medico surgical ICU"[Title/Abstract] OR "mixed medical and surgical ICU"[Title/Abstract] OR "mixed surgical and medical ICU"[Title/Abstract] OR "MODS"[Title/Abstract] OR "MODS multiple organ dysfunction

	syndrome"[Title/Abstract] OR "multi organ disease"[Title/Abstract] OR "multiorgan dysfunction syndrome"[Title/Abstract] OR "multiorgan failure"[Title/Abstract] OR "multiple organ disease"[Title/Abstract] OR "Multiple Organ Dysfunction Syndrome"[Title/Abstract] OR "Multiple Organ Failure*"[Title/Abstract] OR "multisystem organ failure"[Title/Abstract] OR "Myocardial Infarct*"[Title/Abstract] OR "myocardium infarct*"[Title/Abstract] OR "nonseptic shock"[Title/Abstract] OR "pancreas inflammation"[Title/Abstract] OR "pancreatic inflammation"[Title/Abstract] OR "Pancreatic Parenchyma with Edema"[Title/Abstract] OR "Pancreatic Parenchymal Edema*"[Title/Abstract] OR "Pancreatitis"[Title/Abstract] OR "Pediatric Respiratory Distress Syndrome"[Title/Abstract] OR "Peripancreatic Fat Necros*"[Title/Abstract] OR "premonitory infarction sign"[Title/Abstract] OR "pulmonary distress syndrome"[Title/Abstract] OR "Pyaemia*"[Title/Abstract] OR "Pyemia*"[Title/Abstract] OR "Pyohemia*"[Title/Abstract] OR "RDS"[Title/Abstract] OR "respiration distress syndrome"[Title/Abstract] OR "respiratory care unit*"[Title/Abstract] OR "Respiratory Distress Syndrome*"[Title/Abstract] OR "sanarelli shwartzman syndrome"[Title/Abstract] OR "second heart attack"[Title/Abstract] OR "Sepsis"[Title/Abstract] OR "sepsis syndrome"[Title/Abstract] OR "septic disease"[Title/Abstract] OR "Septicemia*"[Title/Abstract] OR "Severe Sepsis"[Title/Abstract] OR "Shock"[Title/Abstract] OR "shock index"[Title/Abstract] OR "shock intensity"[Title/Abstract] OR "Shock Lung"[Title/Abstract] OR "shock syndrome"[Title/Abstract] OR "special care unit"[Title/Abstract] OR "spontaneous defibrination"[Title/Abstract] OR "subendocardial infarction"[Title/Abstract] OR "sun stroke"[Title/Abstract] OR "sunstroke"[Title/Abstract] OR "surgery medical ICU"[Title/Abstract] OR "surgical medical ICU*"[Title/Abstract] OR "surgical shock"[Title/Abstract] OR "transmural heart infarction"[Title/Abstract] OR "traumatic pancreatitis"[Title/Abstract] OR "Unit Intensive Care"[Title/Abstract]	
5	(#1 OR #2) AND (#3 OR #4)	263

The search strategy (embase)

Search number	Query	Results
1	'erythroblast'/exp	8167
2	'erythroblast':ab,ti,kw OR 'erythroblast kinetics':ab,ti,kw OR 'erythroblast proliferation':ab,ti,kw OR 'erythroblastic cell':ab,ti,kw OR 'erythroblasts':ab,ti,kw OR 'normoblast*':ab,ti,kw OR 'nrbcs':ab,ti,kw OR 'nucleated erythrocyte*':ab,ti,kw OR 'nucleated red blood cell*':ab,ti,kw OR 'proerythroblast*':ab,ti,kw OR 'pronormoblast*':ab,ti,kw	10440
3	'critical illness'/exp OR 'intensive care unit'/exp OR 'sepsis'/exp OR	1929344

	'respiratory distress syndrome'/exp OR 'pancreatitis'/exp OR 'acute kidney failure'/exp OR 'acute coronary syndrome'/exp OR 'heart infarction'/exp OR 'liver failure'/exp OR 'shock'/exp OR 'disseminated intravascular clotting'/exp OR 'heat stroke'/exp OR 'multiple organ failure'/exp	
4	'abdominal sepsis':ab,ti,kw OR 'acute coronary syndrome':ab,ti,kw OR 'acute edematous pancreatitides':ab,ti,kw OR 'acute edematous pancreatitis':ab,ti,kw OR 'acute kidney failure*':ab,ti,kw OR 'acute kidney injur*':ab,ti,kw OR 'acute kidney insufficienc*':ab,ti,kw OR 'acute pancreatiti*':ab,ti,kw OR 'acute renal failure*':ab,ti,kw OR 'acute renal injur*':ab,ti,kw OR 'acute renal insufficienc*':ab,ti,kw OR 'acute respiratory distress syndrome':ab,ti,kw OR 'adult respiratory distress syndrome':ab,ti,kw OR 'blood poisoning*':ab,ti,kw OR 'bloodstream infection*':ab,ti,kw OR 'breathing distress syndrome':ab,ti,kw OR 'cardiac infarct*':ab,ti,kw OR 'cardial infarct':ab,ti,kw OR 'cardiovascular collapse':ab,ti,kw OR 'cardiovascular stroke*':ab,ti,kw OR 'circulation shock':ab,ti,kw OR 'circulatory collapse':ab,ti,kw OR 'circulatory failure':ab,ti,kw OR 'circulatory shock':ab,ti,kw OR 'close attention unit':ab,ti,kw OR 'combined medical and surgical icu':ab,ti,kw OR 'combined surgical and medical icu':ab,ti,kw OR 'consumption coagulopathies':ab,ti,kw OR 'consumption coagulopathy':ab,ti,kw OR 'consumptive coagulopathy':ab,ti,kw OR 'consumptive thrombohaemorrhagic disorder':ab,ti,kw OR 'consumptive thrombohemorrhagic disorder':ab,ti,kw OR 'critical care unit':ab,ti,kw OR 'critical illness*':ab,ti,kw OR 'critically ill':ab,ti,kw OR 'dic syndrome':ab,ti,kw OR 'diffuse intravasal coagulation':ab,ti,kw OR 'diffuse intravascular blood coagulation':ab,ti,kw OR 'diffuse intravascular clotting':ab,ti,kw OR 'diffuse intravascular coagulation':ab,ti,kw OR 'diffuse intravascular coagulopathy':ab,ti,kw OR 'disseminated fibrin thromboembolism':ab,ti,kw OR 'disseminated intravasal blood coagulation':ab,ti,kw OR 'disseminated intravasal clotting':ab,ti,kw OR 'disseminated intravasal coagulation':ab,ti,kw OR 'disseminated intravasal coagulopathia':ab,ti,kw OR 'disseminated intravasal coagulopathy':ab,ti,kw OR 'disseminated intravasal thromboembolism':ab,ti,kw OR 'disseminated intravascular blood clotting':ab,ti,kw OR 'disseminated intravascular blood coagulation':ab,ti,kw OR 'disseminated intravascular clotting':ab,ti,kw OR 'disseminated intravascular coagulation*':ab,ti,kw OR 'disseminated intravascular coagulopathy':ab,ti,kw OR 'disseminated intravascular thromboembolism':ab,ti,kw OR 'focal sepsis':ab,ti,kw OR 'general icu':ab,ti,kw OR 'gicu*':ab,ti,kw OR 'heart attack*':ab,ti,kw OR 'heart infarct*':ab,ti,kw OR 'heart micro infarction':ab,ti,kw OR 'heart muscle infarction':ab,ti,kw OR 'heat stroke*':ab,ti,kw OR 'heatstroke*':ab,ti,kw OR 'hepatic failure':ab,ti,kw OR 'hepatic insufficiency':ab,ti,kw OR 'hereditary pancreatitis':ab,ti,kw OR 'human ards':ab,ti,kw OR 'hypovolemic shock':ab,ti,kw OR 'icu intensive care units':ab,ti,kw OR 'incremental shock':ab,ti,kw OR 'intensive care department':ab,ti,kw OR 'intensive care unit*':ab,ti,kw OR 'intensive therapy unit':ab,ti,kw OR 'intensive treatment	1669401

	unit':ab,ti,kw OR 'intraabdominal sepsis':ab,ti,kw OR 'intravasal agglutination':ab,ti,kw OR 'intravasal blood clotting':ab,ti,kw OR 'intravasal clotting':ab,ti,kw OR 'intravascular blood clotting':ab,ti,kw OR 'intravascular clotting':ab,ti,kw OR 'intravascular coagulation':ab,ti,kw OR 'intravascular coagulopathy':ab,ti,kw OR 'intravascular diffuse coagulation':ab,ti,kw OR 'intravascular disseminated blood coagulation':ab,ti,kw OR 'intravascular disseminated clotting':ab,ti,kw OR 'intravascular disseminated coagulation*':ab,ti,kw OR 'intravascular disseminated coagulopathy':ab,ti,kw OR 'intravenous coagulation':ab,ti,kw OR 'kidney acute failure':ab,ti,kw OR 'liver failure':ab,ti,kw OR 'liver insufficiency':ab,ti,kw OR 'lung distress syndrome':ab,ti,kw OR 'massive intravasal coagulopathy':ab,ti,kw OR 'medical surgery icu':ab,ti,kw OR 'medical surgical icu*':ab,ti,kw OR 'medico surgical icu':ab,ti,kw OR 'mixed medical and surgical icu':ab,ti,kw OR 'mixed surgical and medical icu':ab,ti,kw OR 'mods':ab,ti,kw OR 'mods multiple organ dysfunction syndrome':ab,ti,kw OR 'multi organ disease':ab,ti,kw OR 'multiorgan dysfunction syndrome':ab,ti,kw OR 'multiorgan failure':ab,ti,kw OR 'multiple organ disease':ab,ti,kw OR 'multiple organ dysfunction syndrome':ab,ti,kw OR 'multiple organ failure*':ab,ti,kw OR 'multisystem organ failure':ab,ti,kw OR 'myocardial infarct*':ab,ti,kw OR 'myocardium infarct*':ab,ti,kw OR 'nonseptic shock':ab,ti,kw OR 'pancreas inflammation':ab,ti,kw OR 'pancreatic inflammation':ab,ti,kw OR 'pancreatic parenchyma with edema':ab,ti,kw OR 'pancreatic parenchymal edema*':ab,ti,kw OR 'pancreatitis':ab,ti,kw OR 'pediatric respiratory distress syndrome':ab,ti,kw OR 'peripancreatic fat necros*':ab,ti,kw OR 'premonitory infarction sign':ab,ti,kw OR 'pulmonary distress syndrome':ab,ti,kw OR 'pyaemia*':ab,ti,kw OR 'pyemia*':ab,ti,kw OR 'pyohemia*':ab,ti,kw OR 'rds':ab,ti,kw OR 'respiration distress syndrome':ab,ti,kw OR 'respiratory care unit*':ab,ti,kw OR 'respiratory distress syndrome*':ab,ti,kw OR 'sanarelli shwartzman syndrome':ab,ti,kw OR 'second heart attack':ab,ti,kw OR 'sepsis':ab,ti,kw OR 'sepsis syndrome':ab,ti,kw OR 'septic disease':ab,ti,kw OR 'septicemia*':ab,ti,kw OR 'severe sepsis':ab,ti,kw OR 'shock':ab,ti,kw OR 'shock index':ab,ti,kw OR 'shock intensity':ab,ti,kw OR 'shock lung':ab,ti,kw OR 'shock syndrome':ab,ti,kw OR 'special care unit':ab,ti,kw OR 'spontaneous defibrination':ab,ti,kw OR 'subendocardial infarction':ab,ti,kw OR 'sun stroke':ab,ti,kw OR 'sunstroke':ab,ti,kw OR 'surgery medical icu':ab,ti,kw OR 'surgical medical icu*':ab,ti,kw OR 'surgical shock':ab,ti,kw OR 'transmural heart infarction':ab,ti,kw OR 'traumatic pancreatitis':ab,ti,kw OR 'unit intensive care':ab,ti,kw	
5	(#1 OR #2) AND (#3 OR #4)	557

The search strategy (Cochrane)

Search	Query	Results

number		
1	[Erythroblasts] explode all trees	10
2	('Erythroblast' OR 'erythroblast kinetics' OR 'erythroblast proliferation' OR 'erythroblastic cell' OR 'Erythroblasts' OR 'Normoblast*' OR 'NRBCs' OR 'Nucleated Erythrocyte*' OR 'Nucleated red blood cell*' OR 'Proerythroblast*' OR 'Pronormoblast*'):ab,ti,kw	90
3	[Critical Illness] explode all trees	4045
4	[Intensive Care Units] explode all trees	6751
5	[Sepsis] explode all trees	6797
6	[Respiratory Distress Syndrome] explode all trees	3701
7	[Pancreatitis] explode all trees	1935
8	[Acute Kidney Injury] explode all trees	2640
9	[Myocardial Infarction] explode all trees	15905
10	[Acute Coronary Syndrome] explode all trees	3239
11	[Liver Failure] explode all trees	1272
12	[Shock] explode all trees	3696
13	[Disseminated Intravascular Coagulation] explode all trees	146
14	[Heat Stroke] explode all trees	32
15	[Multiple Organ Failure] explode all trees	566
16	('abdominal sepsis' OR 'Acute Coronary Syndrome' OR 'Acute Edematous Pancreatitides' OR 'Acute Edematous Pancreatitis' OR 'Acute Kidney Failure*' OR 'Acute Kidney Injur*' OR 'Acute Kidney Insufficienc*' OR 'Acute Pancreatiti*' OR 'acute renal failure*' OR 'Acute Renal Injur*' OR 'acute renal insufficienc*' OR 'Acute Respiratory Distress Syndrome' OR 'Adult Respiratory Distress Syndrome' OR 'Blood Poisoning*' OR 'Bloodstream Infection*' OR 'breathing distress syndrome' OR 'cardiac infarct*' OR 'cardial infarct' OR 'cardiovascular collapse' OR 'Cardiovascular Stroke*' OR 'circulation shock' OR 'circulatory collapse' OR 'Circulatory Failure' OR 'circulatory shock' OR 'close attention unit' OR 'combined medical and surgical ICU' OR 'combined surgical and medical ICU' OR 'Consumption Coagulopathies' OR 'consumption coagulopathy' OR 'consumptive coagulopathy' OR 'consumptive thrombohaemorrhagic disorder' OR 'consumptive thrombohemorrhagic disorder' OR 'critical care unit' OR 'critical illness*' OR 'Critically Ill' OR 'DIC syndrome' OR 'diffuse intravasal coagulation' OR 'diffuse intravascular blood coagulation' OR 'diffuse intravascular clotting' OR 'diffuse intravascular coagulation' OR 'diffuse intravascular coagulopathy' OR 'disseminated fibrin thromboembolism' OR 'disseminated intravasal blood coagulation' OR 'disseminated intravasal clotting' OR 'disseminated intravasal coagulation' OR 'disseminated intravasal coagulopathia' OR 'disseminated intravasal coagulopathy' OR 'disseminated intravasal thromboembolism' OR 'disseminated intravascular blood clotting' OR 'disseminated intravascular blood coagulation' OR 'disseminated intravascular clotting' OR 'Disseminated Intravascular Coagulation*' OR 'disseminated intravascular coagulopathy'	157934

	OR 'disseminated intravascular thromboembolism' OR 'focal sepsis' OR 'general ICU' OR 'GICU*' OR 'Heart Attack*' OR 'heart infarct*' OR 'heart micro infarction' OR 'heart muscle infarction' OR 'Heat Stroke*' OR 'Heatstroke*' OR 'Hepatic Failure' OR 'hepatic insufficiency' OR 'hereditary pancreatitis' OR 'Human ARDS' OR 'Hypovolemic Shock' OR 'ICU Intensive Care Units' OR 'incremental shock' OR 'intensive care department' OR 'Intensive Care Unit*' OR 'intensive therapy unit' OR 'intensive treatment unit' OR 'intraabdominal sepsis' OR 'intravasal agglutination' OR 'intravasal blood clotting' OR 'intravasal clotting' OR 'intravascular blood clotting' OR 'intravascular clotting' OR 'intravascular coagulation' OR 'intravascular coagulopathy' OR 'intravascular diffuse coagulation' OR 'intravascular disseminated blood coagulation' OR 'intravascular disseminated clotting' OR 'Intravascular Disseminated Coagulation*' OR 'intravascular disseminated coagulopathy' OR 'intravenous coagulation' OR 'kidney acute failure' OR 'Liver Failure' OR 'liver insufficiency' OR 'lung distress syndrome' OR 'massive intravasal coagulopathy' OR 'medical surgery ICU' OR 'medical surgical ICU*' OR 'medico surgical ICU' OR 'mixed medical and surgical ICU' OR 'mixed surgical and medical ICU' OR 'MODS' OR 'MODS multiple organ dysfunction syndrome' OR 'multi organ disease' OR 'multiorgan dysfunction syndrome' OR 'multiorgan failure' OR 'multiple organ disease' OR 'Multiple Organ Dysfunction Syndrome' OR 'Multiple Organ Failure*' OR 'multisystem organ failure' OR 'Myocardial Infarct*' OR 'myocardium infarct*' OR 'nonseptic shock' OR 'pancreas inflammation' OR 'pancreatic inflammation' OR 'Pancreatic Parenchyma with Edema' OR 'Pancreatic Parenchymal Edema*' OR 'Pancreatitis' OR 'Pediatric Respiratory Distress Syndrome' OR 'Peripancreatic Fat Necros*' OR 'premonitory infarction sign' OR 'pulmonary distress syndrome' OR 'Pyaemia*' OR 'Pyemia*' OR 'Pyohemia*' OR 'RDS' OR 'respiration distress syndrome' OR 'respiratory care unit*' OR 'Respiratory Distress Syndrome*' OR 'sanarelli shwartzman syndrome' OR 'second heart attack' OR 'Sepsis' OR 'sepsis syndrome' OR 'septic disease' OR 'Septicemia*' OR 'Severe Sepsis' OR 'Shock' OR 'shock index' OR 'shock intensity' OR 'Shock Lung' OR 'shock syndrome' OR 'special care unit' OR 'spontaneous defibrination' OR 'subendocardial infarction' OR 'sun stroke' OR 'sunstroke' OR 'surgery medical ICU' OR 'surgical medical ICU*' OR 'surgical shock' OR 'transmural heart infarction' OR 'traumatic pancreatitis' OR 'Unit Intensive Care'):ab,ti,kw	
17	(#1 OR #2) AND (#3 OR #4 OR #5 OR #6 OR #7 OR #8 OR #9 OR #10 OR #11 OR #12 OR #13 OR #14 OR #15 OR #16)	5

The search strategy (WOS)

Search number	Query	Results
1	TS= ((Erythroblast) OR (erythro (Erythroblast) OR (erythroblast kinetics)	24576

	OR (erythroblast proliferation) OR (erythroblastic cell) OR (Erythroblasts) OR (Normoblast*) OR (NRBCs) OR (Nucleated Erythrocyte*) OR (Nucleated red blood cell*) OR (Proerythroblast*) OR (Pronormoblast*) blast kinetics) OR (erythroblast proliferation) OR (erythroblastic cell) OR (Erythroblasts) OR (Normoblast*) OR (NRBCs) OR (Nucleated Erythrocyte*) OR (Nucleated red blood cell*) OR (Proerythroblast*) OR (Pronormoblast*))	
2	TS=((abdominal sepsis) OR (Acute Coronary Syndrome) OR (Acute Edematous Pancreatitides) OR (Acute Edematous Pancreatitis) OR (Acute Kidney Failure*) OR (Acute Kidney Injur*) OR (Acute Kidney Insufficienc*) OR (Acute Pancreatiti*) OR (acute renal failure*) OR (Acute Renal Injur*) OR (acute renal insufficienc*) OR (Acute Respiratory Distress Syndrome) OR (Adult Respiratory Distress Syndrome) OR (Blood Poisoning*) OR (Bloodstream Infection*) OR (breathing distress syndrome) OR (cardiac infarct*) OR (cardial infarct) OR (cardiovascular collapse) OR (Cardiovascular Stroke*) OR (circulation shock) OR (circulatory collapse) OR (Circulatory Failure) OR (circulatory shock) OR (close attention unit) OR (combined medical and surgical ICU) OR (combined surgical and medical ICU) OR (Consumption Coagulopathies) OR (consumption coagulopathy) OR (consumptive coagulopathy) OR (consumptive thrombohaemorrhagic disorder) OR (consumptive thrombohemorrhagic disorder) OR (critical care unit) OR (critical illness*) OR (Critically Ill) OR (DIC syndrome) OR (diffuse intravasal coagulation) OR (diffuse intravascular blood coagulation) OR (diffuse intravascular clotting) OR (diffuse intravascular coagulation) OR (diffuse intravascular coagulopathy) OR (disseminated fibrin thromboembolism) OR (disseminated intravasal blood coagulation) OR (disseminated intravasal clotting) OR (disseminated intravasal coagulation) OR (disseminated intravasal coagulopathia) OR (disseminated intravasal coagulopathy) OR (disseminated intravasal thromboembolism) OR (disseminated intravascular blood clotting) OR (disseminated intravascular blood coagulation) OR (disseminated intravascular clotting) OR (Disseminated Intravascular Coagulation*) OR (disseminated intravascular coagulopathy) OR (disseminated intravascular thromboembolism) OR (focal sepsis) OR (general ICU) OR (GICU*) OR (Heart Attack*) OR (heart infarct*) OR (heart micro infarction) OR (heart muscle infarction) OR (Heat Stroke*) OR (Heatstroke*) OR (Hepatic Failure) OR (hepatic insufficiency) OR (hereditary pancreatitis) OR (Human ARDS) OR (Hypovolemic Shock) OR (ICU Intensive Care Units) OR (incremental shock) OR (intensive care department) OR (Intensive Care Unit*) OR (intensive therapy unit) OR (intensive treatment unit) OR (intraabdominal sepsis) OR (intravasal agglutination) OR (intravasal blood clotting) OR (intravasal clotting) OR (intravascular blood clotting) OR (intravascular clotting) OR (intravascular coagulation) OR (intravascular coagulopathy) OR (intravascular diffuse coagulation) OR (intravascular	3801835

	disseminated blood coagulation) OR (intravascular disseminated clotting) OR (Intravascular Disseminated Coagulation*) OR (intravascular disseminated coagulopathy) OR (intravenous coagulation) OR (kidney acute failure) OR (Liver Failure) OR (liver insufficiency) OR (lung distress syndrome) OR (massive intravasal coagulopathy) OR (medical surgery ICU) OR (medical surgical ICU*) OR (medico surgical ICU) OR (mixed medical and surgical ICU) OR (mixed surgical and medical ICU) OR (MODS) OR (MODS multiple organ dysfunction syndrome) OR (multi organ disease) OR (multiorgan dysfunction syndrome) OR (multiorgan failure) OR (multiple organ disease) OR (Multiple Organ Dysfunction Syndrome) OR (Multiple Organ Failure*) OR (multisystem organ failure) OR (Myocardial Infarct*) OR (myocardium infarct*) OR (nonseptic shock) OR (pancreas inflammation) OR (pancreatic inflammation) OR (Pancreatic Parenchyma with Edema) OR (Pancreatic Parenchymal Edema*) OR (Pancreatitis) OR (Pediatric Respiratory Distress Syndrome) OR (Peripancreatic Fat Necros*) OR (premonitory infarction sign) OR (pulmonary distress syndrome) OR (Pyaemia*) OR (Pyemia*) OR (Pyohemia*) OR (RDS) OR (respiration distress syndrome) OR (respiratory care unit*) OR (Respiratory Distress Syndrome*) OR (sanarelli shwartzman syndrome) OR (second heart attack) OR (Sepsis) OR (sepsis syndrome) OR (septic disease) OR (Septicemia*) OR (Severe Sepsis) OR (Shock) OR (shock index) OR (shock intensity) OR (Shock Lung) OR (shock syndrome) OR (special care unit) OR (spontaneous defibrination) OR (subendocardial infarction) OR (sun stroke) OR (sunstroke) OR (surgery medical ICU) OR (surgical medical ICU*) OR (surgical shock) OR (transmural heart infarction) OR (traumatic pancreatitis) OR (Unit Intensive Care))	
3	#1 AND #2	1302

Table S1. Summary of adjusted covariates

Author	Year	Adjusted covariates
P. F. Czempik and A. Wiórek	2025	Sepsis-related Organ Failure Assessment, Age, Sex
A. Stachon et al	2004	Age, CRP, Blood concentrations of hemoglobin, Leukocytes
J. Wang et al	2023	ALT, AST, P, LDH
H. Q. Liu et al	2024	Age, CHF, Renal disease, Vasopressin, Norepinephrine, SOFA, SAPSII, OASIS, LODS, APSIII, MAP
A. Kirsch et al	2024	ECMO, Charlson Comorbidity Index, CRP
F. Niebhagen et al	2025	RRT, Age, SOFA, Septic shock at ICU admission
J. G. De Moura Monteiro Júnior et al	2015	Sex, APACHE II, Sepsis
M. Menk et al	2018	APACHE II (admission), Pulmonary compliance (admission)
A. Stachon et al	2007	Leukocytes, Prothrombin time ratio, ALT; CRP, APACHE II
S. W. Purtle et al	2017	Age, Race, Gender, Deyo–Charlson Index, Patient type (medical versus surgical), Sepsis, Acute organ failure
A. Stachon et al	2006	Creatinine, Prothrombin time ratio, CRP
J. G. de Moura Monteiro Junior et al	2018	Age, Leukocytes, TNT, NLR, MVP

Abbreviations**:** ALT, alanine aminotransferase; APACHE II, Acute Physiology and Chronic Health Evaluation II; APS III, Acute Physiology Score III; AST, aspartate aminotransferase; CHF, congestive heart failure; CRP, C-reactive protein; ECMO, extracorporeal membrane oxygenation; ICU, intensive care unit; LDH, lactate dehydrogenase; LODS, Logistic Organ Dysfunction System; MAP, mean arterial pressure; MPV, mean platelet volume; NLR, neutrophil-to-lymphocyte ratio; NRBC, nucleated red blood cell; OASIS, Oxford Acute Severity of Illness Score; P, phosphorus; RRT, renal replacement therapy; SAPS II, Simplified Acute Physiology Score II; SOFA, Sequential Organ Failure Assessment; TnT, troponin T.

Table S2. Baseline characteristics of included studies

Author	Year	Study Design	Country	PatientsNo.	Male/Female	Age	Disease type	Testing timing	Peak	Testing method	Cut-off	Parameter unit	Adjusted	Outcome
C. Xu et al	2020	cohort	China	92	57/35	56.64 (21.97)	SAP	at ICU admission	NO	BC-6800 plus automatic blood cell counter (Mindray, Shenzhen, Guangdong, China)	＞0	/	NO	90-day mortality (OR)
P. F. Czempik and A. Wiórek	2025	cohort	Poland	190	96/94	62.19 (14.94)	sepsis	at ICU admission	NO	XN-1000 (Sysmex, Kobe, Japan)	＞0	$\times 10^3\ \mu L^{-1}$	YES	30-day mortality (OR)
T. Noor et al	2023	cohort	Pakistan	800	/	18-70	ICU patients	daily during the ICU stay	YES	SYSMEX XN-9000 (Sysmex Corporation, Kobe, Hyogo, Japan)	＞0	L^{-1}	NO	30-day mortality (OR)
R. Shah et al	2012	cohort	USA	9690	/	/	surgical ICU patients	daily during the ICU stay	NO	Beckman Coulter (Brea, CA) 750 analyzer	＞0	/	NO	30-day mortality (OR), hospital stay
A. Stachon et al	2004	cohort	German	81	44/37	64.00 (2.00)	ICU patients	initial detection during the ICU stay	NO	Sysmex XE-2100 analyzer (Sysmex; Norderstedt, Germany)	＞0	μL^{-1}	YES	30-day mortality (OR)
J. Wang et al	2023	cohort	China	177	119/58	69.69 (17.81)	ICU patients	within 3 days of ICU admission	YES	Mindray BC-6800 plus automated hematology system(Mindray, Shenzhen, China)	＞0	$\times 10^3\ \mu L^{-1}$	YES	30-day mortality (HR)

H. Q. Liu et al	2024	cohort	Israel	354	204/150	/	SAP	at ICU admission	NO	/	/	%	YES	90-day mortality (OR), 30-day mortality (OR)
G. Schmidt et al	2024	cohort	Belgium	206	140/68	63.95 (12.69)	ARDS	during the ICU stay	YES	in the routine clinical laboratories	＞0	μL^{-1}	NO	30-day mortality (HR), hospital stay, ICU stay
S. Loesaus et al	2023	cohort	German	30	26/4	62.70 (14.30)	cardiothoracic surgery patients	daily during the ICU stay	NO	UniCel DxH 600—Coulter Cellular Analysis System (Sysmex, Kobe, Japan)	≥270	μL^{-1}	NO	30-day mortality (OR, HR)
S. Desai et al	2012	cohort	USA	275	123/152	60.05 (17.31)	sepsis	any time after a diagnosis of sepsis during the whole ICU stay	YES	Sysmex XE-2100 Automated Hematology System(Sysmex America, Inc., Mundelin, IL)	＞0	μL^{-1}	NO	30-day mortality (OR), hospital stay
A. Kirsch et al	2024	cohort	German	413	295/118	62.35 (9.67)	ARDS	daily during the ICU stay	YES	/	≥500	μL^{-1}	YES	30-day mortality (OR, HR), ICU stay
F. Niebhagen et al	2025	cohort	German	465	331/134	65.65 (11.15)	sepsis	daily during the ICU stay	YES	Sysmex SN series haematology analyser	≥100	μL^{-1}	YES	30-day mortality(OR, HR)
J. G. De Moura Monteiro Júnior et al	2015	cohort	Brazil	152	67/85	60.60 (16.80)	CCU patients	daily during the ICU stay	YES	Sysmex XE-2100 blood analyzer	＞0	μL^{-1}	YES	30-day mortality (OR)
M. Menk et al	2018	cohort	German	404	265/139	49.30 (17.86)	ARDS	daily during the ICU stay	YES	Sysmex XN-9000 hematology analyzer (Sysmex, Kobe, Japan)	＞0	μL^{-1}	YES	30-day mortality(OR, HR)
A. Stachon et al	2007	cohort	German	383	223/160	66.35 (1.45)	ICU patients	daily during the ICU stay	NO	Sysmex XE-2100 (Sysmex Europe GmbH, Norderstedt, Germany)	＞0	μL^{-1}	YES	30-day mortality(OR), ICU stay

S. W. Purtle et al	2017	cohort	USA	2878	1568/1310	61.40 (18.00)	ICU patients	from 2 days prior to 7 days after ICU admission	YES	Sysmex XE-5000 Automated Hematology System	＞0	μL^{-1}	YES	90-day mortality (OR), 30-day mortality（OR）
V. K. Dhanni et al	2024	cohort	India	200	142/58	/	ICU patients	/	NO	XN350 Sysmex multi-parameter automated hematology Analyzer	/	/	NO	30-day mortality(OR), ICU stay
A. Stachon et al	2006	cohort	German	284	158/126	60.68 (1.67)	surgical ICU patients	daily during the ICU stay	NO	Sysmex XE-2100 (Sysmex, Norderstedt, Germany)	＞0	μL^{-1}	YES	30-day mortality(OR)
S. A. Hashmi et al	2023	cohort	Pakistan	151	97/54	61.10 (10.70)	myocardial Infarction	over up to five days at 24-hour intervals during the ICU stay	YES	/	＞0	/	NO	30-day mortality(OR), hospital stay
J. G. de Moura Monteiro Junior et al	2018	cohort	Brazil	466	287/179	64.20 (12.80)	myocardial infarction	daily during the hospital stay	NO	Sysmex XE-2100 blood analyzer (Sysmex, Kobe, Japan)	＞0	μL^{-1}	YES	30-day mortality(HR)

Abbreviations**:** ARDS, acute respiratory distress syndrome; CCU, cardiac care unit; CI, confidence interval; HR, hazard ratio; ICU, intensive care unit; NRBC, nucleated red blood cell; OR, odds ratio; SAP, severe acute pancreatitis; SD, standard deviation; USA, United States of America.

Table S3. Study-by-analysis matrix

Author	Year	30-day mortality (OR)	30-day mortality (HR)	90-day mortality (OR)	Hospital stay	ICU stay	Dose–response analysis
C. Xu et al	2020			✓			
P. F. Czempik and A. Wiórek	2025	✓					
T. Noor et al	2023	✓					
R. Shah et al	2012	✓			✓		
A. Stachon et al	2004	✓					
J. Wang et al	2023		✓				
H. Q. Liu et al	2024	✓		✓			
G. Schmidt et al	2024		✓		✓	✓	✓
S. Loesaus et al	2023	✓	✓				
S. Desai et al	2012	✓			✓		✓
A. Kirsch et al	2024	✓	✓			✓	✓
F. Niebhagen et al	2025	✓	✓				✓
J. G. De Moura Monteiro Júnior et al	2015	✓					✓
M. Menk et al	2018	✓	✓				✓
A. Stachon et al	2007	✓				✓	✓
S. W. Purtle et al	2017	✓		✓			✓
V. K. Dhanni et al	2024	✓				✓	
A. Stachon et al	2006	✓					✓
S. A. Hashmi et al	2023	✓			✓		
J. G. de Moura Monteiro Junior et al	2018		✓				✓

Abbreviations**:** HR, hazard ratio; ICU, intensive care unit; OR, odds ratio.

Table S4. Quality assessment of included studies using the NOS

Author	Year	selection				Comparability	Outcome			Total Score
		Representativeness of the exposed cohort	Selection of the non-exposed cohort	Ascertainment of exposure	Outcome not present at baseline	Comparability of cohorts	Assessment of outcome	Follow-up long enough for outcomes	Adequacy of follow-up	
C. Xu et al	2020	1	1	1	1	1	1	1	1	8
P. F. Czempik and A. Wiórek	2025	1	1	1	1	2	1	1	1	9
T. Noor et al	2023	1	1	1	1	1	1	1	1	8
R. Shah et al	2012	1	1	1	1	1	1	1	1	8
A. Stachon et al	2004	1	1	1	1	2	1	1	1	9
J. Wang et al	2023	1	1	1	1	2	1	1	1	9
H. Q. Liu et al	2024	1	1	1	1	2	1	1	1	9
G. Schmidt et al	2024	1	1	1	1	2	1	1	1	9
S. Loesaus et al	2023	0	1	1	1	1	1	1	1	7
S. Desai et al	2012	1	1	1	1	1	1	1	1	8
A. Kirsch et al	2024	1	1	1	1	2	1	1	1	9

F. Niebhagen et al	2025	1	1	1	1	2	1	1	1	9
J. G. De Moura Monteiro Júnior et al	2015	1	1	1	1	2	1	1	1	9
M. Menk et al	2018	1	1	1	1	2	1	1	1	9
A. Stachon et al	2007	1	1	1	1	1	1	1	1	8
S. W. Purtle et al	2017	1	1	1	1	2	1	1	1	9
V. K. Dhanni et al	2024	1	1	1	1	1	1	1	1	8
A. Stachon et al	2006	1	1	1	1	2	1	1	1	9
S. A. Hashmi et al	2023	1	1	1	1	1	1	1	1	8
J. G. de Moura Monteiro Junior et al	2018	1	1	1	1	2	1	1	1	9

Abbreviation**:** NOS, Newcastle–Ottawa Scale.

Table S5. Certainty of evidence assessment using the GRADE system

№ of studies	Certainty assessment						Effect	Certainty
	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations		
30-day mortality (OR)								
16	Cohort studies	serious	serious	not serious	not serious	Publication bias strongly suspected Strong association Dose response gradient	OR = 3.14 (95% CI: 2.13–4.62)	⊕⊕⊕◯ Moderate
30-day mortality (HR)								
7	Cohort studies	serious	serious	not serious	not serious	none	HR = 1.55 (95% CI: 1.24–1.93)	⊕⊕◯◯ Low
90-day mortality (OR)								
3	Cohort studies	serious	serious	not serious	serious	none	OR = 3.78 (95% CI: 0.77–18.54)	⊕◯◯◯ Very low
Total length of hospital stay (days)								
4	Cohort studies	serious	serious	not serious	serious	none	MD = 8.73 (95% CI: 2.14–15.33)	⊕◯◯◯ Very low
ICU length of stay (days)								
4	Cohort studies	serious	serious	not serious	serious	none	MD = 7.51 (95% CI: 3.29–11.73)	⊕◯◯◯ Very low

Abbreviations**:** CI, confidence interval; GRADE, Grading of Recommendations Assessment, Development and Evaluation; HR, hazard ratio; ICU, intensive care unit; MD, mean difference; OR, odds ratio.

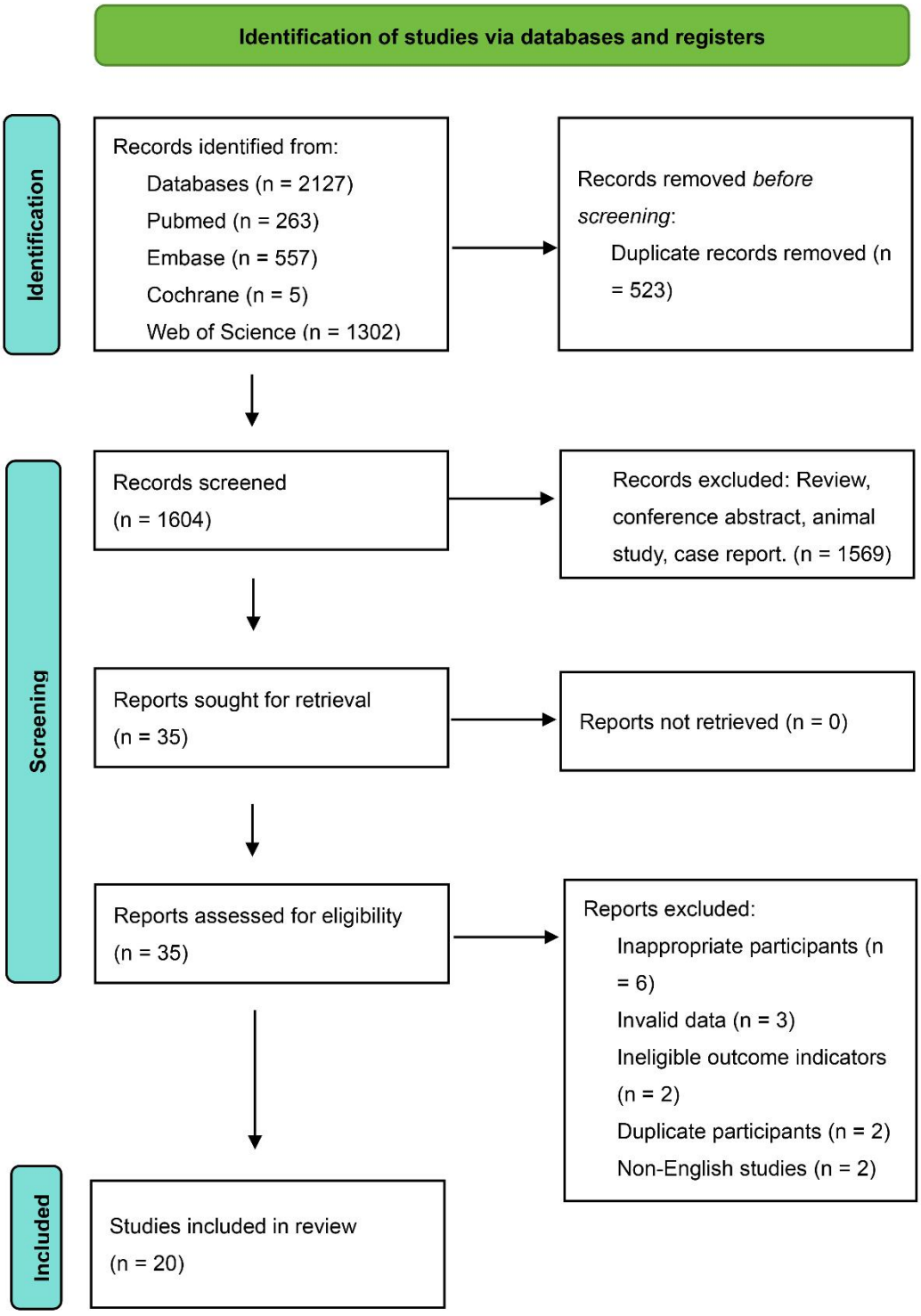

Figure S1. PRISMA flow diagram of study selection

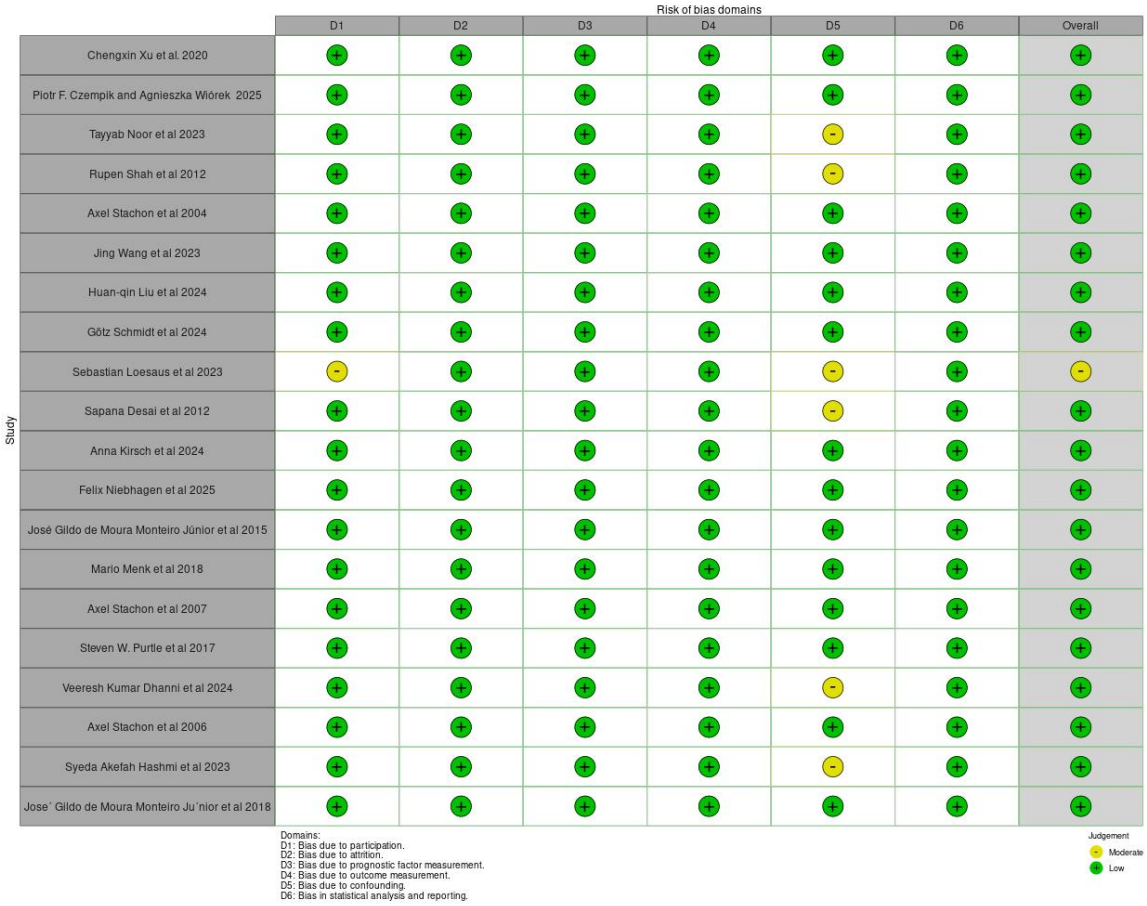

Figure S2. Risk-of-bias assessment of included studies using the QUIPS tool. The heatmap summarizes domain-level and overall risk-of-bias judgments for each included cohort study. D1–D6 correspond to the six QUIPS domains: study participation, study attrition, prognostic factor measurement, outcome measurement, confounding, and statistical analysis and reporting. Green circles with plus signs indicate low risk of bias, whereas yellow circles with minus signs indicate moderate risk of bias. Most studies were judged to have low overall risk of bias, with moderate concerns observed mainly in selected domains and no study rated as high risk. **Abbreviations:** D1, bias due to study participation; D2, bias due to study attrition; D3, bias due to prognostic factor measurement; D4, bias due to outcome measurement; D5, bias due to confounding; D6, bias in statistical analysis and reporting; QUIPS, Quality In Prognosis Studies.

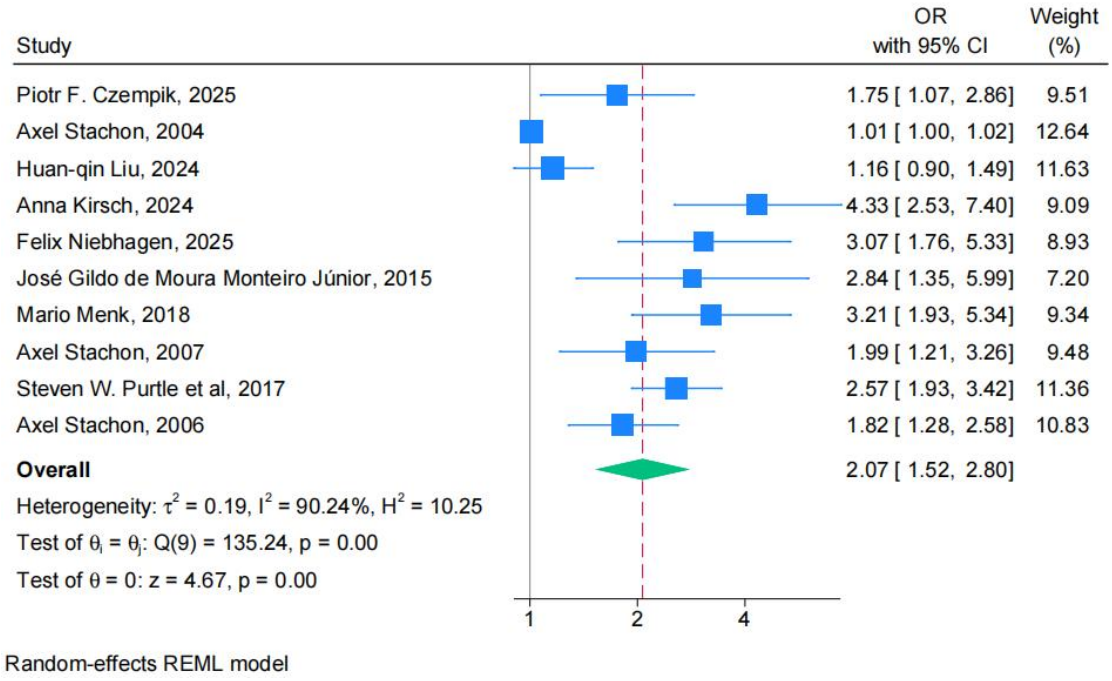

Figure S3. Forest plot of 30-day mortality by NRBC status in critically ill patients using adjusted estimates only. The forest plot shows study-specific and pooled adjusted ORs for 30-day mortality comparing NRBC-positive with NRBC-negative critically ill patients. Blue squares represent individual study estimates, with square size proportional to study weight, and horizontal lines indicate 95% CIs. The solid vertical line denotes OR = 1, the dashed vertical line indicates the pooled effect estimate, and the green diamond represents the overall random-effects REML estimate. In the analysis restricted to studies reporting adjusted estimates, NRBC positivity remained significantly associated with higher 30-day mortality (OR = 2.07, 95% CI: 1.52–2.80), with substantial heterogeneity (I^2 = 90.24%). **Abbreviations:** CI, confidence interval; NRBC, nucleated red blood cell; OR, odds ratio; REML, restricted maximum likelihood.

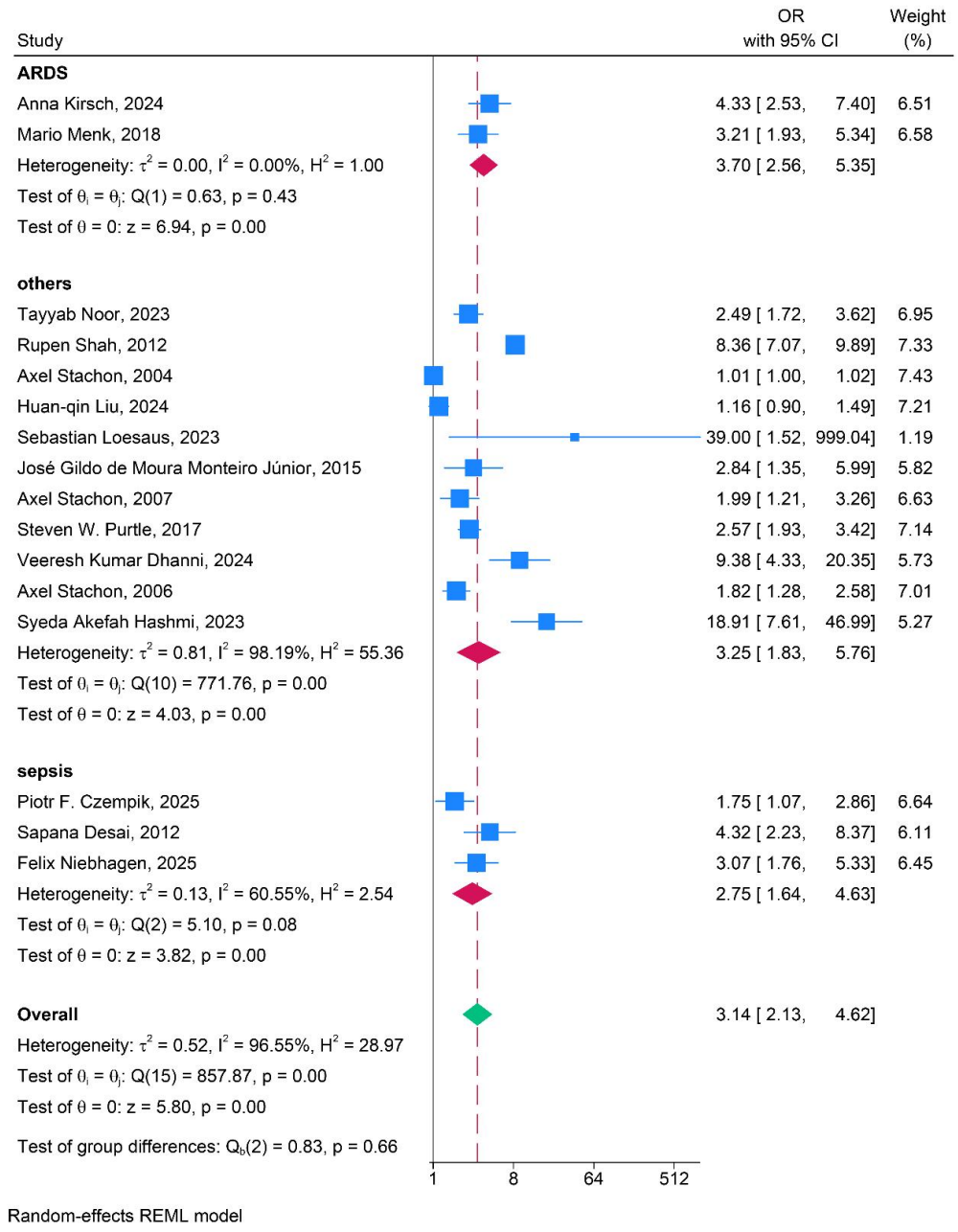

Figure S4. Forest plot of subgroup analysis of 30-day mortality by disease type in NRBC studies. The forest plot shows study-specific and pooled ORs for 30-day mortality comparing NRBC-positive with NRBC-negative critically ill patients, stratified by disease type (ARDS, sepsis, and others). Blue squares represent individual study estimates, with square size proportional to study weight, and horizontal lines indicate 95% CIs. Pink diamonds represent pooled subgroup estimates, and the green diamond represents the overall random-effects REML estimate. NRBC positivity was significantly associated with higher 30-day mortality

in the ARDS subgroup (OR = 3.70, 95% CI: 2.56–5.35), the sepsis subgroup (OR = 2.75, 95% CI: 1.64–4.63), and the subgroup of other critically ill populations (OR = 3.25, 95% CI: 1.83–5.76). The overall pooled OR was 3.14 (95% CI: 2.13–4.62), and no significant between-subgroup difference was observed (P = 0.66), indicating that the association between NRBC positivity and 30-day mortality was broadly consistent across disease categories. **Abbreviations:** ARDS, acute respiratory distress syndrome; CI, confidence interval; NRBC, nucleated red blood cell; OR, odds ratio; REML, restricted maximum likelihood.

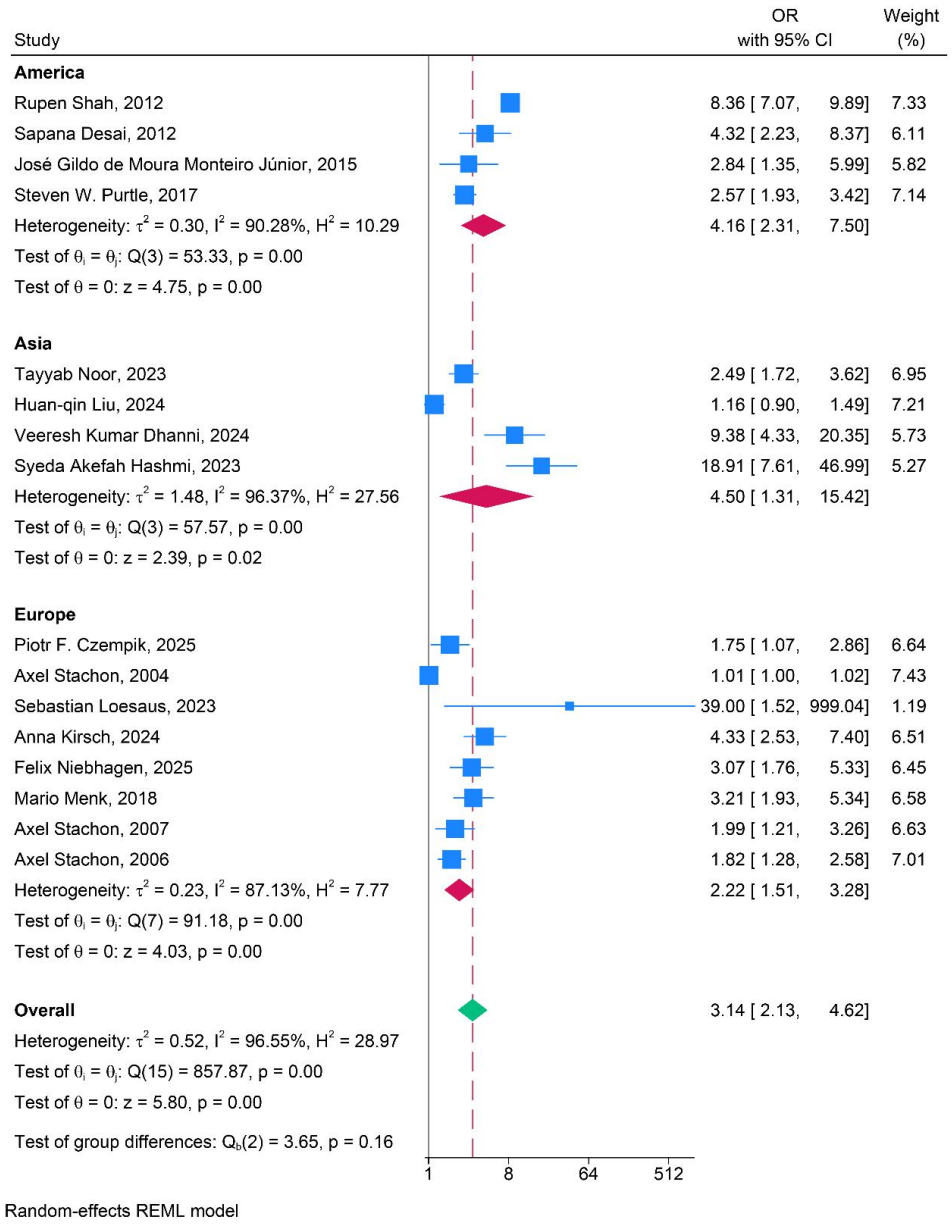

Figure S5. Forest plot of subgroup analysis of 30-day mortality by geographic region in NRBC studies. The forest plot shows study-specific and pooled ORs for 30-day mortality comparing NRBC-positive with NRBC-negative critically ill patients, stratified by geographic region (America, Asia, and Europe). Blue squares represent individual study estimates, with square size proportional to study weight, and horizontal lines indicate 95% CIs. Pink diamonds represent pooled subgroup estimates, and the green diamond represents the overall random-effects REML estimate. NRBC positivity was significantly associated with higher 30-day mortality in America (OR = 4.16, 95% CI: 2.31–7.50), Asia (OR = 4.50, 95% CI: 1.31–15.42),

and Europe (OR = 2.22, 95% CI: 1.51–3.28). The overall pooled OR was 3.14 (95% CI: 2.13–4.62), with no significant between-subgroup difference (P = 0.16), indicating that the association between NRBC positivity and 30-day mortality was generally consistent across geographic regions. **Abbreviations:** CI, confidence interval; NRBC, nucleated red blood cell; OR, odds ratio; REML, restricted maximum likelihood.

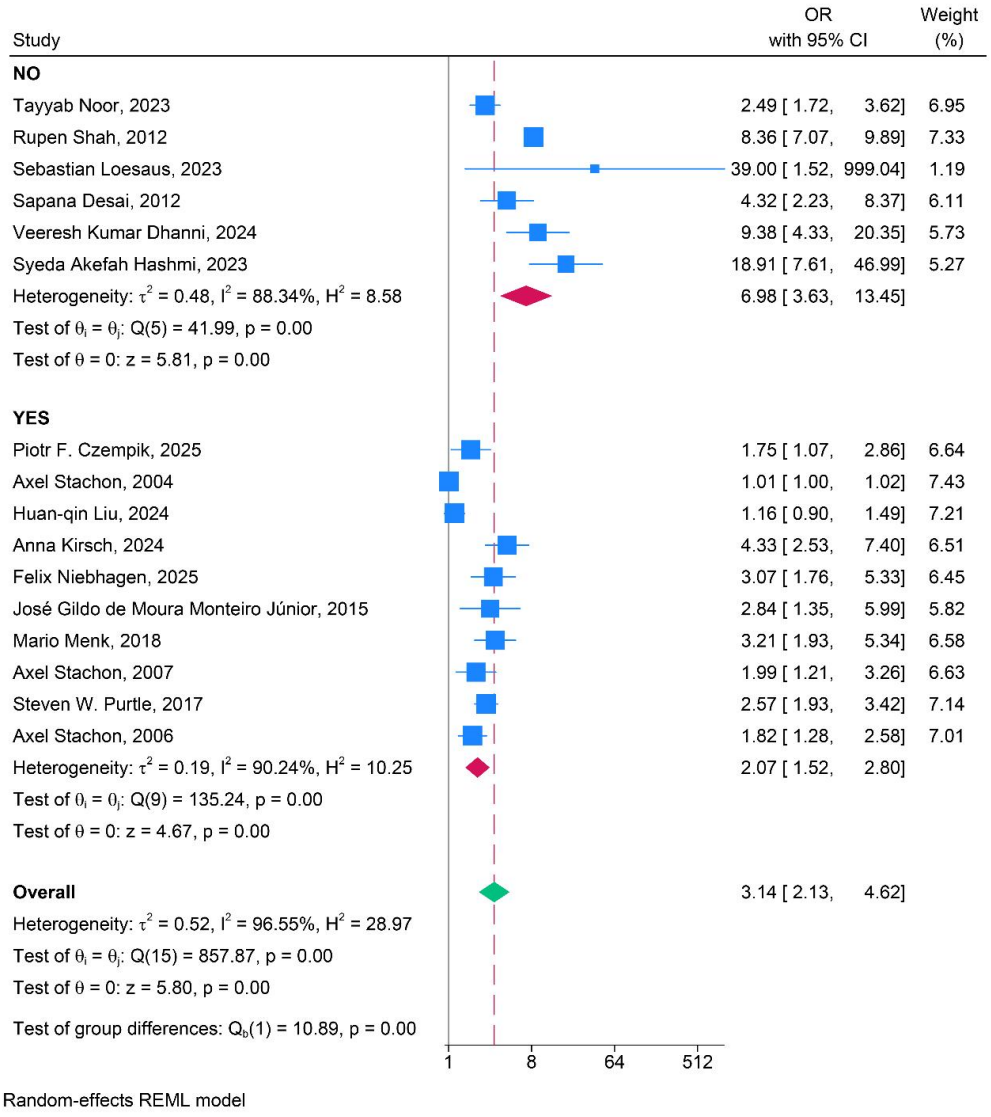

Figure S6. Forest plot of subgroup analysis of 30-day mortality by confounder adjustment in NRBC studies. The forest plot shows study-specific and pooled ORs for 30-day mortality by NRBC status, stratified according to whether estimates were adjusted for confounders. Blue squares represent individual study estimates, with square size proportional to study weight, and horizontal lines indicate 95% CIs. Pink

diamonds represent pooled subgroup estimates, and the green diamond represents the overall random-effects REML estimate. NRBC positivity was associated with higher 30-day mortality in both unadjusted studies (OR = 6.98, 95% CI: 3.63–13.45) and adjusted studies (OR = 2.07, 95% CI: 1.52–2.80). The significant between-subgroup difference ($P < 0.01$) suggests that confounder adjustment contributed to between-study heterogeneity. **Abbreviations:** CI, confidence interval; NRBC, nucleated red blood cell; OR, odds ratio; REML, restricted maximum likelihood.

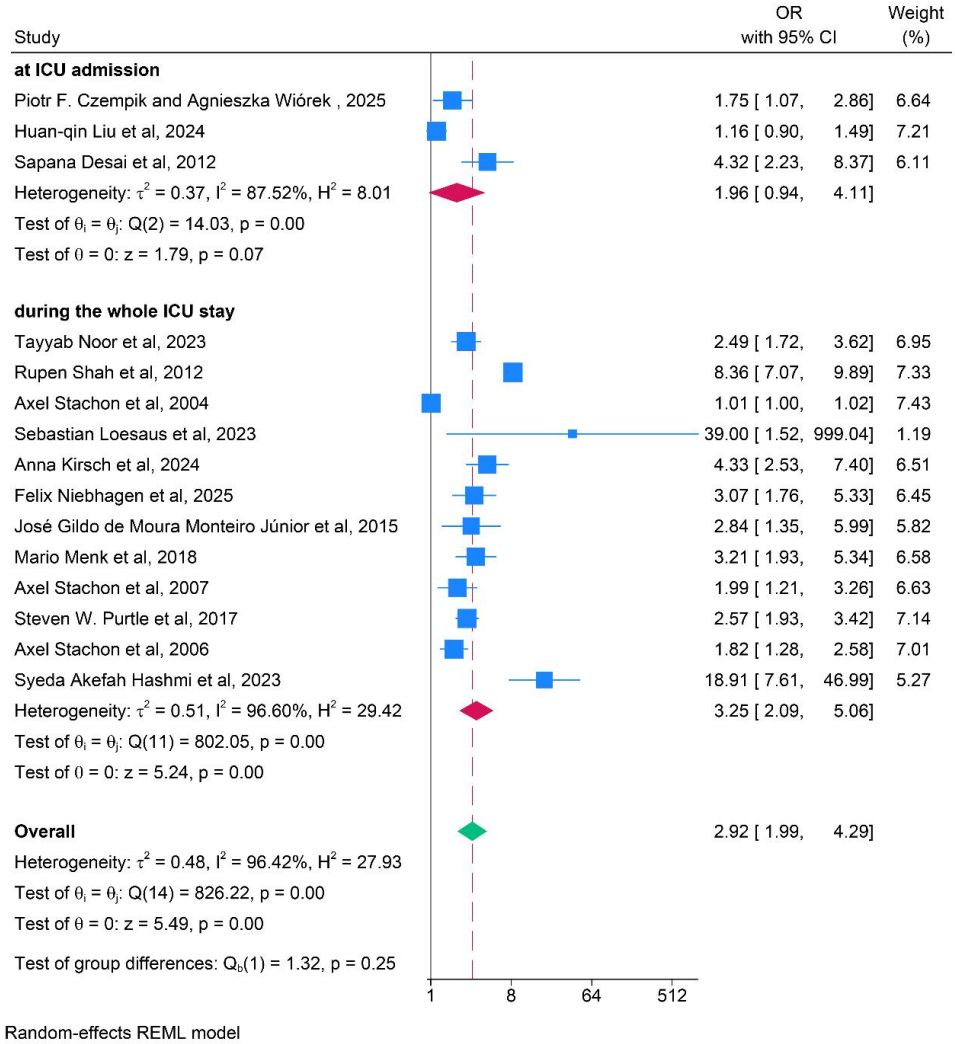

Figure S7. Forest plot of subgroup analysis of 30-day mortality by timing of NRBC testing in NRBC studies. The forest plot shows study-specific and pooled ORs for 30-day mortality by NRBC status, stratified according to testing timing: at ICU admission and during the whole ICU stay. Blue squares represent individual

study estimates, with square size proportional to study weight, and horizontal lines indicate 95% CIs. Pink diamonds represent pooled subgroup estimates, and the green diamond represents the overall random-effects REML estimate. NRBC positivity was not significantly associated with 30-day mortality in studies testing at ICU admission (OR = 1.96, 95% CI: 0.94–4.11), whereas a significant association was observed in studies testing during the whole ICU stay (OR = 3.25, 95% CI: 2.09–5.06). The overall pooled OR was 2.92 (95% CI: 1.99–4.29), and no significant between-subgroup difference was observed (P = 0.25). **Abbreviations:** CI, confidence interval; ICU, intensive care unit; NRBC, nucleated red blood cell; OR, odds ratio; REML, restricted maximum likelihood.

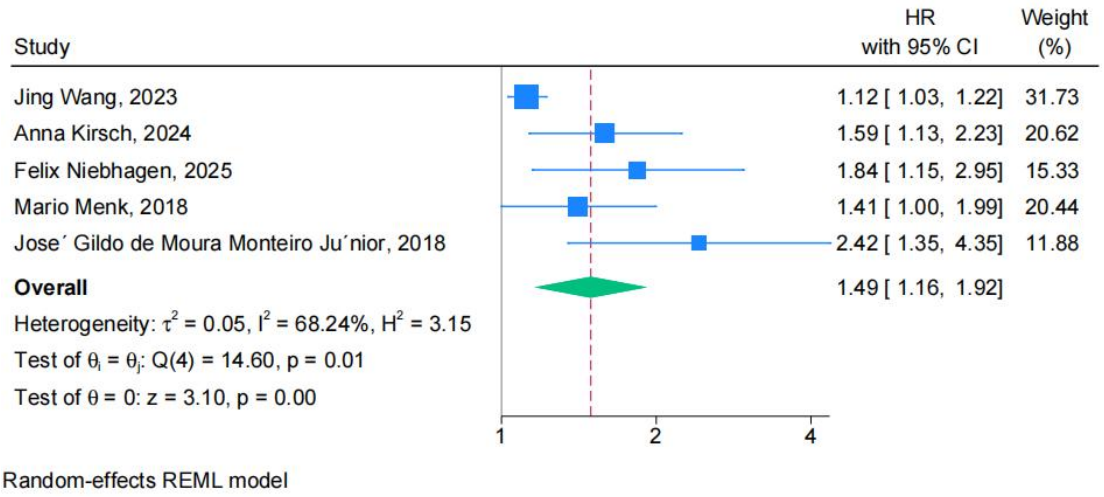

Figure S8. Forest plot of 30-day mortality by NRBC status using adjusted HR estimates only. The forest plot shows study-specific and pooled adjusted HRs for 30-day mortality comparing NRBC-positive with NRBC-negative critically ill patients. Blue squares represent individual study estimates, with square size proportional to study weight, and horizontal lines indicate 95% CIs. The solid vertical line denotes HR = 1, the dashed vertical line indicates the pooled effect estimate, and the green diamond represents the overall random-effects REML estimate. In the analysis restricted to adjusted estimates, NRBC positivity remained significantly

associated with higher 30-day mortality (HR = 1.49, 95% CI: 1.16–1.92), with moderate heterogeneity (I^2 = 68.24%). **Abbreviations:** CI, confidence interval; HR, hazard ratio; NRBC, nucleated red blood cell; REML, restricted maximum likelihood.

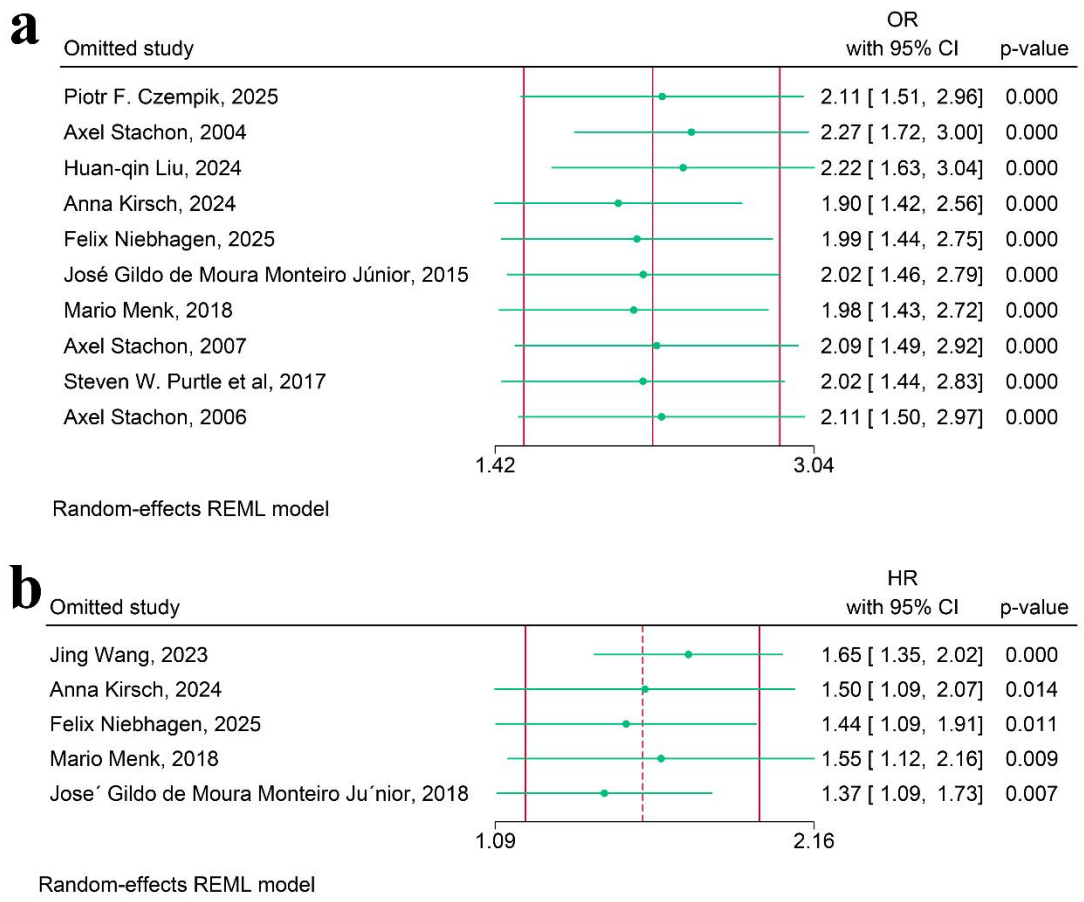

Figure S9. Leave-one-out sensitivity analyses of 30-day mortality by NRBC status using adjusted estimates only. (A) Sensitivity analysis of 30-day mortality expressed as adjusted ORs. **(B)** Sensitivity analysis of 30-day mortality expressed as adjusted HRs. Each row shows the recalculated pooled estimate after sequential omission of one study. The pooled associations remained statistically significant in all iterations for both OR- and HR-based analyses, supporting the robustness of the adjusted estimates for the association between NRBC positivity and higher 30-day mortality in critically ill patients. **Abbreviations:** CI, confidence interval; HR, hazard

ratio; NRBC, nucleated red blood cell; OR, odds ratio; REML, restricted maximum likelihood.

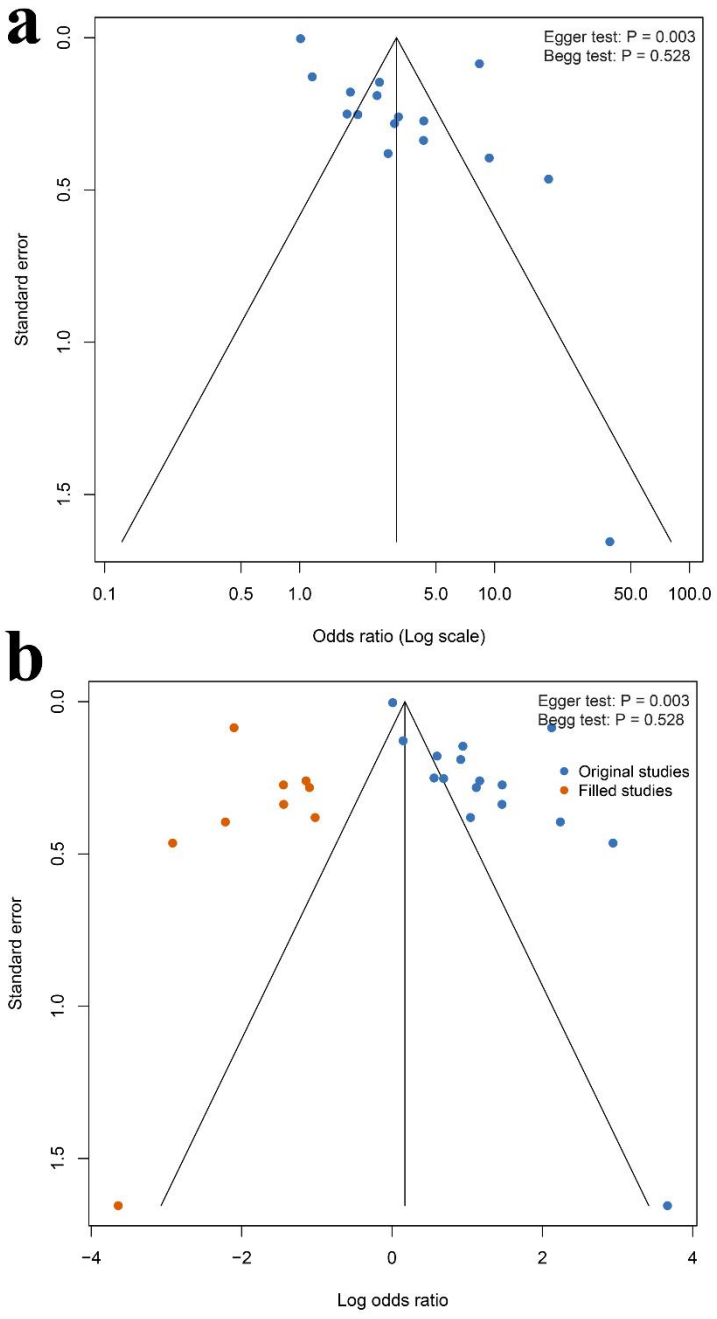

Figure S10. Publication-bias assessment for the NRBC–30-day mortality analysis based on ORs. (A) Funnel plot showing the distribution of included studies according to OR and SE. Blue points represent original studies, and the triangular region indicates the expected distribution in the absence of small-study effects. Funnel-plot asymmetry and a significant Egger test (P = 0.003) suggested potential publication

bias, whereas the Begg test was not significant (P = 0.528). **(B)** Trim-and-fill analysis showing original studies in blue and imputed studies in orange. The filled studies indicate potential missing evidence, although the corrected analysis should be interpreted cautiously given the substantial heterogeneity across included studies. **Abbreviations:** NRBC, nucleated red blood cell; OR, odds ratio; SE, standard error.