

**Supplementary Data: Central VBG-diagnosis of each blood gas sample by three clinicians and the corresponding ABG-diagnosis.**

<b>ABG Diagnosis</b>	<b>Diagnostician 1</b>	<b>Diagnostician 2</b>	<b>Diagnostician 3</b>
Metabolic Acidosis, Respiratory Alkalosis	Metabolic Acidosis, Respiratory Alkalosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Alkalosis
Respiratory Acidosis	Respiratory Acidosis	Respiratory Acidosis	Respiratory Acidosis
Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis	Respiratory Acidosis	Respiratory Acidosis
None	Metabolic Alkalosis, Respiratory Acidosis	Respiratory Acidosis	Metabolic Alkalosis, Respiratory Acidosis
Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Respiratory Acidosis	Metabolic Alkalosis, Respiratory Acidosis	Respiratory Acidosis	Respiratory Acidosis
Respiratory Alkalosis	Respiratory Alkalosis	Metabolic Acidosis, Respiratory Alkalosis	Metabolic Acidosis, Respiratory Alkalosis
Metabolic Acidosis	Metabolic Acidosis, Respiratory Alkalosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis
Metabolic Acidosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Respiratory Alkalosis	Respiratory Alkalosis	Metabolic Acidosis, Respiratory Alkalosis	Metabolic Acidosis, Respiratory Alkalosis
Metabolic Acidosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Metabolic Acidosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Metabolic Alkalosis	Metabolic Alkalosis	Metabolic Alkalosis	Metabolic Alkalosis, Respiratory Acidosis
Respiratory Alkalosis	Respiratory Acidosis	None	None
Metabolic Acidosis, Respiratory Alkaloses	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis
None	Metabolic Acidosis, Respiratory Acidosis	Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Respiratory Alkalosis	Respiratory Alkalosis	Respiratory Alkalosis	Respiratory Alkalosis
Metabolic Alkalosis	Metabolic Alkalosis	Metabolic Alkalosis	Metabolic Alkalosis
Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Acidosis
Respiratory Alkalosis	Metabolic Acidosis, Respiratory Alkalosis	Metabolic Acidosis, Respiratory Acidosis	Metabolic Acidosis, Respiratory Alkalosis