

SPIRONOLACTONE

Indication	<ul style="list-style-type: none"> • Treatment of bronchopulmonary dysplasia^{1,2} <ul style="list-style-type: none"> ○ Increased aldosterone secretion^{1,2} ○ Oedema and cardiomyopathy^{1,3,4} 	
ORAL	Presentation	<ul style="list-style-type: none"> • Oral solution: 2.5 mg in 1 mL
	Dosage ^{1,3,4}	<ul style="list-style-type: none"> • 0.5–1 mg/kg once daily <ul style="list-style-type: none"> ○ May be given in two divided doses every 12 hours ○ Maximum dose 3 mg/kg/day
	Preparation	<ul style="list-style-type: none"> • Shake well • Draw up prescribed dose into oral/enteral syringe
	Administration	<ul style="list-style-type: none"> • Oral/OGT/NGT after feeds <ul style="list-style-type: none"> ○ Food increases absorption and reduces gastric irritation⁴
Special considerations	<ul style="list-style-type: none"> • Tablets not recommended as an alternative to oral solution as they do not disperse easily • Contraindicated in hyperkalaemia^{1,4,5} • Caution if: <ul style="list-style-type: none"> ○ Impaired renal function and reduced urinary output^{1,4,5} ○ Suspected adrenal insufficiency¹ 	
Monitoring	<ul style="list-style-type: none"> • Electrolytes (particularly serum potassium)⁵ <ul style="list-style-type: none"> ○ If ongoing therapy or impaired renal function, continue regular monitoring (at SMO discretion)^{1,5} 	
Compatibility	<ul style="list-style-type: none"> • Nil known 	
Incompatibility	<ul style="list-style-type: none"> • Nil known 	
Interactions	<ul style="list-style-type: none"> • Alprostadil: increased risk of hypotension⁴ • Captopril: increased risk of hypotension and hyperkalaemia⁴ • Clonidine: increased risk of hypotension⁴ • Diazoxide: increased risk of hypotension⁴ • Digoxin: shown to increase the half-life of digoxin, which may result in increased serum digoxin levels and subsequent digitalis toxicity⁴ • Esmolol: increased risk of hypotension⁴ • Furosemide: increased risk of hypotension and hyponatraemia⁴ • Heparin: increased risk of hyperkalaemia⁴ • Hydralazine: increased risk of hypotension⁴ • Hydrochlorothiazide: increased risk of hypotension and hyponatraemia⁴ • Ibuprofen: increased risk of hyponatraemia and hyperkalaemia⁴ • Indometacin: increased risk of hyponatraemia and hyperkalaemia⁴ • Potassium chloride: increased risk of hyperkalaemia⁴ • Sildenafil: increased risk of hypotension⁴ • Trimethoprim: increased risk of hyponatraemia and hyperkalaemia⁴ 	
Stability	<ul style="list-style-type: none"> • Refrigerate 2–8 °C¹ • Discard as per manufacturer's instructions or as per local unit policy 	
Side effects	<ul style="list-style-type: none"> • Blood pathology: hyperkalaemia^{1,4,5}, hyponatraemia^{1,5}, agranulocytosis^{4,5}, thrombocytopenia⁴, leucopenia⁴ • Digestive: diarrhoea^{1,5}, vomiting^{1,5} • Endocrine: antiandrogenic properties⁶ • Integumentary: rash^{1,5} • Urinary: development of nephrocalcinosis¹ 	



Actions	<ul style="list-style-type: none"> • Acts on distal renal tubules as a competitive inhibitor of mineralocorticosteroids (e.g. aldosterone) thereby improving heart failure⁷ • Increases sodium and water excretion, and reduces potassium excretion⁵ • May be given alone or with other diuretic agents that act more proximally in the renal tubule^{1,6}
Abbreviations	ACE: angiotensin-converting enzyme, NGT: nasogastric tube, OGT: orogastric tube, SMO: most senior medical officer
Keywords	antihypertensive, bronchopulmonary dysplasia, cardiomyopathy, chronic neonatal lung disease, diuretic, hypertension, neonatal medicine, neonatal monograph, oedema, potassium sparing, spironolactone

The Queensland Clinical Guideline *Neonatal Medicines* is integral to and should be read in conjunction with this monograph. Refer to the disclaimer. Destroy all printed copies of this monograph after use.

References

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Document history

ID number	Effective	Review	Summary of updates
NMedQ24.112-V1-R29	25/03/2024	25/03/2029	Endorsed by Queensland Neonatal Services Group (QNSAG)

QR code

