South Australian Neonatal Medication Guidelines

Phosphate sodium (oral)
500mg elemental phosphorus tablets

Note:
This guideline provides advice of a general nature. This statewide guideline has been prepared to promote and facilitate standardisation and consistency of practice, using a multidisciplinary approach. The guideline is based on a review of published evidence and expert opinion.

Information in this statewide guideline is current at the time of publication.

SA Health does not accept responsibility for the quality or accuracy of material on websites linked from this site and does not sponsor, approve or endorse materials on such links.

Health practitioners in the South Australian public health sector are expected to review specific details of each patient and professionally assess the applicability of the relevant guideline to that clinical situation.

If for good clinical reasons, a decision is made to depart from the guideline, the responsible clinician must document in the patient’s medical record, the decision made, by whom, and detailed reasons for the departure from the guideline.

This statewide guideline does not address all the elements of clinical practice and assumes that the individual clinicians are responsible for discussing care with consumers in an environment that is culturally appropriate and which enables respectful confidential discussion. This includes:

- The use of interpreter services where necessary,
- Advising consumers of their choice and ensuring informed consent is obtained,
- Providing care within scope of practice, meeting all legislative requirements and maintaining standards of professional conduct, and
- Documenting all care in accordance with mandatory and local requirements

Synonyms
Phosphorus

Generic Ingredients
Phosphate Phebra® (phosphate sodium) tablets contain 500 mg of elemental phosphorous (equivalent to 16.1 mmol phosphate) and must be dispersed in water.

Phosphate Phebra® tablets contain approx. 1.27 mmol sodium for every 1 mmol phosphate.

Dose and Indications

Treatment for hypophosphataemia and osteopenia of prematurity

Oral
Doses should always be expressed as mmol of phosphate.
1 to 3 mmol/kg/day. Give in 2 to 4 divided doses.
Adjust according to phosphate and/or calcium levels

Preparation and Administration

Oral
There are TWO STEPS to this process.

<table>
<thead>
<tr>
<th>Dose</th>
<th>0.25 mmol</th>
<th>0.5 mmol</th>
<th>0.75 mmol</th>
<th>1 mmol</th>
<th>1.25 mmol</th>
</tr>
</thead>
<tbody>
<tr>
<td>Volume</td>
<td>0.25 mL</td>
<td>0.5 mL</td>
<td>0.75 mL</td>
<td>1 mL</td>
<td>1.25 mL</td>
</tr>
</tbody>
</table>

STEP ONE: Dissolve one tablet of phosphate sodium (16.1 mmol) in 10 mL of sterile water.
STEP TWO: Further dilute the above solution with sterile water to a final volume of 16 mL.
The final solution contains 1 mmol/mL of phosphate.
Adverse Effects

Common
Nausea, diarrhoea

Infrequent
Hypotension, hypocalcaemia

Monitoring
  > Serum phosphate, calcium, alkaline phosphatase, sodium and potassium levels.

Practice Points
  > Doses should be adjusted accordingly to maintain plasma phosphate levels at approximately 2 mmol/L.
  > Consideration should be given to the sodium and potassium content of Phosphate-Phebra® tablets in cases of electrolyte imbalance. Each tablet also provides sodium 469 mg (equivalent to 20.4 mmol), potassium 123 mg (equivalent to 3.1 mmol).
  > Separate from calcium salts by TWO hours, as concurrent administration may reduce absorption due to binding and formation of insoluble salts.

Document Ownership & History

Developed by: SA Maternal, Neonatal & Gynaecology Community of Practice
Contact: Health.NeoMed@sa.gov.au
Endorsed by: Safety and Quality, Clinical Support and Improvement, SA Health
Next review due: 22/03/2027
ISBN number: 978-1-76083-394-7
CGQS reference: NMG012
Policy history:
  Is this a new policy (V1)? N
  Does this policy amend or update and existing policy? Y
  If so, which version? V4
  Does this policy replace another policy with a different title? N
  If so, which policy (title)?

<table>
<thead>
<tr>
<th>Approval Date</th>
<th>Version</th>
<th>Who approved New/Revised Version</th>
<th>Reason for Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>18/10/2023</td>
<td>V4.1</td>
<td>Domain Custodian, Clinical Governance, Safety and Quality</td>
<td>Minor update</td>
</tr>
<tr>
<td>22/3/2022</td>
<td>V4.0</td>
<td>Domain Custodian, Executive Director, Commissioning and Performance, Department for Health and Wellbeing, SA</td>
<td></td>
</tr>
<tr>
<td>9/3/2018</td>
<td>V3.1</td>
<td>SA Health Safety and Quality Strategic Governance Committee</td>
<td>Review date extended to 5 years following risk assessment</td>
</tr>
<tr>
<td>03/2015</td>
<td>V3.0</td>
<td>SA Health Safety and Quality Strategic Governance Committee</td>
<td>Reviewed version</td>
</tr>
<tr>
<td>10/2014</td>
<td>V2.0</td>
<td>SA Health Safety and Quality Strategic Governance Committee</td>
<td>Reviewed version</td>
</tr>
<tr>
<td>09/2014</td>
<td>V1.0</td>
<td>SA Health Safety and Quality Strategic Governance Committee</td>
<td>Original SA Health Safety and Quality Strategic Governance Committee approved version</td>
</tr>
</tbody>
</table>