Nursing Process Focus:  
Patients Receiving Gentamicin (Garamycin)

### Assessment
Prior to administration:
- Obtain complete health history including allergies, drug history and possible drug interactions.
- Assess for presence/history of local or systemic infection.
- Obtain vital signs.
- Obtain history of drug allergies.

### Potential Nursing Diagnoses
- Risk for Injury, related to renal insufficiency related to aminoglycoside therapy
- Risk for Injury, related to disturbances of balance and impaired ability to detect environmental hazards
- Deficient Knowledge, related to drug therapy and side effects

### Planning: Patient Goals and Expected Outcomes
The patient will:
- Maintain normal renal function throughout drug therapy.
- Demonstrate knowledge of drug therapy and side effects.
- Remain free of physical injury.

### Implementation

<table>
<thead>
<tr>
<th>Interventions and (Rationales)</th>
<th>Patient Education/Discharge Planning</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>Use with caution with impaired renal function or neuromuscular disorders. (Renal impairment can increase the risk of toxicity with this drug. Patients with neuromuscular disorders may experience greater muscular weakness due to possible neuromuscular blockade with the drug’s action.)</em></td>
<td><em>Instruct patient to provide thorough history of medical conditions and treatment to health care provider.</em></td>
</tr>
</tbody>
</table>
| *Monitor for signs of renal toxicity including unusual appearance of urine (dark, cloudy) intake and output ratio, and the presence of edema.* | Instruct patient:
  - to increase fluid intake to 2000 ml per day.
  - to report evidence of decreased urinary output to the health care provider. |
| *Monitor for evidence of ototoxicity, including headache, dizziness or vertigo, nausea or vomiting with motion, ataxia, nystagmus, tinnitus, roaring noises, sensation of fullness of ears, and hearing impairment.* | *Instruct patient to notify health care provider if changes in hearing occur.* |
| *Monitor peak and trough drug levels. (Aminoglycosides have a narrow therapeutic range.)* | *Explain to patient that frequent serum drug therapy levels are necessary to prevent and monitor for complications.* |
| *Observe for symptoms of neurotoxicity or neuromuscular blockade.* | *Instruct patient to immediately report muscle twitching, numbness, seizures, weakness, or difficulty breathing to the health care provider.* |
| *Observe for signs and symptoms of bacterial overgrowth due to drug’s effect to “kill” all bacteria, even normal flora that can lead to superinfection.* | *Instruct patient to report diarrhea, anogenital itching, vaginal discharge, stomatitis, or glossitis.* |

### Evaluation of Outcome Criteria
Evaluate the effectiveness of drug therapy by confirming that patient goals and expected outcomes have been met (see “Planning”).