## Chemical Peels

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Dr. O’Neill is from Buffalo Medical Group, New York. The author reports no conflict of interest.

<table>
<thead>
<tr>
<th>Peel</th>
<th>Depth</th>
<th>Concentration</th>
<th>Indications</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glycolic acid</td>
<td>Superficial (epidermis to papillary dermis)</td>
<td>20%–70%; α-hydroxy acid</td>
<td>Acne, rosacea, mild photodamage/ dyspigmentation, keratosis pilaris</td>
<td>Must be neutralized with water or 10% bicarbonate solution</td>
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<tr>
<td>Salicylic acid</td>
<td>Superficial</td>
<td>20%–35%; β-hydroxy acid</td>
<td>Acne, melasma/ dyspigmentation, mild to moderate photodamage</td>
<td>Frosting occurs due to precipitation of salicylic acid crystals, do not use in patients with aspirin allergy due to risk for salicylism, does not need neutralization</td>
</tr>
<tr>
<td>Trichloroacetic acid</td>
<td>Superficial, medium (papillary to reticular dermis)</td>
<td>10%–35% (superficial depth), 40%–50% (medium depth)</td>
<td>Melasma/ dyspigmentation, fine rhytides, actinic keratosis, moderate rhytides, scarring</td>
<td>Frosting noted at concentrations &gt;25%, frosting peaks around 2–4 minutes, does not need neutralization</td>
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<tr>
<td>Jessner</td>
<td>Superficial</td>
<td>14% salicylic acid, 14% lactic acid, 14% resorcinol in ethanol base</td>
<td>Acne, melasma/ dyspigmentation, fine rhytides</td>
<td>May be used to increase depth of penetration of other peels such as retinoic acid, does not need neutralization</td>
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<tr>
<td>Baker-Gordon</td>
<td>Deep (mid reticular dermis)</td>
<td>Phenol, septicol, croton oil in distilled water</td>
<td>Actinic keratosis, severe photodamage, acne scarring, moderate rhytides</td>
<td>Requires cardiac monitoring due to potential cardiotoxicity of phenol; risk for acne/milia, prolonged erythema, permanent hypopigmentation, and hyperpigmentation; use limited to Fitzpatrick skin types I–III</td>
</tr>
</tbody>
</table>

*Antiviral prophylaxis should be prescribed for patients undergoing medium-depth or deeper peels.

*Treatment of acne scarring should be deferred for at least 6 months after completion of a course of isotretinoin due to risk for hypertrophic scarring.
Practice Questions

1. **Which peel requires neutralization?**
   a. Baker-Gordon
   b. glycolic acid
   c. Jessner
   d. salicylic acid
   e. trichloroacetic acid

2. **Which peel contains resorcinol?**
   a. Baker-Gordon
   b. glycolic acid
   c. Jessner
   d. salicylic acid
   e. trichloroacetic acid

3. **Which peel would be the best treatment of severe actinic photodamage?**
   a. Baker-Gordon
   b. glycolic acid
   c. Jessner
   d. salicylic acid
   e. trichloroacetic acid

4. **Which peel would not be indicated for treatment of melasma in a patient with Fitzpatrick skin type IV?**
   a. Baker-Gordon
   b. glycolic acid
   c. Jessner
   d. salicylic acid
   e. trichloroacetic acid

5. **Which peel is a β-hydroxy acid?**
   a. Baker-Gordon
   b. glycolic acid
   c. Jessner
   d. salicylic acid
   e. trichloroacetic acid

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Fact sheets and practice questions will be posted monthly.