### WEEK 8 ASSIGNMENT

Due: 2019-09-20, 23:59:57

<table>
<thead>
<tr>
<th>Question</th>
<th>Points</th>
<th>Due Date</th>
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</thead>
<tbody>
<tr>
<td>1. Short-term implantation study in bone formation in animal studies is usually carried out for</td>
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<td>2. Understanding of bone metabolism is essential for reconstructive surgery.</td>
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<td>3. Antimicrobial activity of ceramic materials is important for dental applications.</td>
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<td>4. Control of surface roughness by acid etching is crucial for bioactivity.</td>
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<td>5. Examination of the mechanical properties of dental ceramics is important.</td>
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<td>6. Surface roughness (SR) is a critical parameter for bone tissue integration.</td>
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<td>7. The flexure test is a standard method for evaluating ceramic strength.</td>
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<td>8. The strength of a ceramic material can be improved by adding fibers.</td>
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<td>9. The compatibility of a material with biological tissues is determined by its biocompatibility.</td>
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### Additional Notes

- **Bone Tissue Integration**
  - Understanding bone metabolism is crucial for reconstructive surgery.
  - Antimicrobial activity of ceramic materials is important for dental applications.
  - Control of surface roughness by acid etching is necessary for bioactivity.

- **Surface Roughness (SR)**
  - SR is a critical parameter for bone tissue integration.

- **Flexure Test**
  - The flexure test is a standard method for evaluating ceramic strength.

- **Biocompatibility**
  - Compatibility with biological tissues is determined by biocompatibility.

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**References**

1. **Bone Tissue Integration**

2. **Surface Roughness (SR)**

3. **Flexure Test**

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**Assessment Criteria**

- **Bone Tissue Integration**: Understanding of bone metabolism is essential for reconstructive surgery. Antimicrobial activity of ceramic materials is important for dental applications.
- **Surface Roughness (SR)**: Surface roughness (SR) is a critical parameter for bone tissue integration.
- **Flexure Test**: The flexure test is a standard method for evaluating ceramic strength.