Grounding Caption

This localization caption provides multi-dimensional spatial analysis of anatomical structures and pathological findings for this panoramic dental X-ray image, including:

Teeth visibility with center points (total: 13):
[
{'point_2d': [781, 305], 'tooth_id': '21', 'score': 0.94},
{'point_2d': [646, 469], 'tooth_id': '43', 'score': 0.9},
{'point_2d': [917, 473], 'tooth_id': '35', 'score': 0.9},
{'point_2d': [725, 308], 'tooth_id': '11', 'score': 0.88},
{'point_2d': [827, 465], 'tooth_id': '33', 'score': 0.87},
{'point_2d': [689, 464], 'tooth_id': '42', 'score': 0.86},
{'point_2d': [760, 455], 'tooth_id': '31', 'score': 0.86},
{'point_2d': [674, 315], 'tooth_id': '12', 'score': 0.84},
{'point_2d': [348, 406], 'tooth_id': '48', 'score': 0.84},
{'point_2d': [723, 456], 'tooth_id': '41', 'score': 0.83},
{'point_2d': [792, 463], 'tooth_id': '32', 'score': 0.82},
{'point_2d': [834, 312], 'tooth_id': '22', 'score': 0.79},
{'point_2d': [833, 313], 'tooth_id': '23', 'score': 0.65}
]

Wisdom teeth detection (total: 1):
[
{'box_2d': [297, 340, 399, 472], 'tooth_id': '48', 'is_impacted': false, 'score': 0.84}
]

Dental Pathological Findings (total: 1):
[
{'box_2d': [1025, 332, 1168, 454], 'tooth_id': 'unknown', 'label': 'impacted', 'score': 0.57, 'near_tooth': '35'}
]

Historical Treatments (total: 4):
[
{'box_2d': [365, 327, 668, 478], 'tooth_id': 'unknown', 'label': 'restoration', 'score': 0.94, 'near_tooth': '43'},
{'box_2d': [848, 335, 1105, 457], 'tooth_id': 'unknown', 'label': 'restoration', 'score': 0.92, 'near_tooth': '35'},
{'box_2d': [848, 392, 895, 538], 'tooth_id': 'unknown', 'label': 'rc-treated', 'score': 0.91, 'near_tooth': '33'},
{'box_2d': [456, 324, 1015, 394], 'tooth_id': 'unknown', 'label': 'restoration', 'score': 0.56, 'near_tooth': '11'}
]

Medical Report

ORAL PANORAMIC X-RAY EXAMINATION REPORT

Teeth-Specific Observations

General Condition

- **Total visualized teeth**: 13 (FDI numbering: #11, #12, #21, #22, #23, #31, #32, #33, #35, #41, #42, #43, #48).

- **Wisdom teeth**: One visualized (#48, non-impacted); others not identified within visible field.

- **Overall dentition**: Partially intact with no evidence of extensive periodontal loss or severe alveolar resorption.

Pathological Findings

- **Tooth #35**: Suspicious for impacted tooth *near* #35 (confidence <0.80).

- No evidence of periapical radiolucency, caries, or calculus within visualized teeth.

Historical Interventions

- **Restorations**:

- Presence of restoration *near* #43.

- Presence of restoration *near* #35.

- Presence of restoration *near* #11.

- **Root canal treatment (rc-treated)**:

- Rc-treated tooth *near* #33.

Clinical Summary & Recommendations

Priority Concerns

- **Impacted tooth suspiciously noted near #35** requires clinical correlation and radiographic evaluation for definitive diagnosis and surgical planning.

Preventive Measures

- Reinforce oral hygiene protocols to mitigate risk of secondary caries in restored teeth (#35, #33, #43).

- Monitor the suspicious area *near* #35 for radiographic progression or clinical symptoms.

Follow-up Protocol

- **Referral to oral surgeon** for evaluation of the suspected impacted area *near* #35.

- **6-month recall** for radiographic reassessment of restorations (#35, #33, #43) and impacted lesion.

- Schedule **endodontic consultation** for rc-treated tooth *near* #33 if asymptomatic and functionally stable.

Generated by AI assistant for preliminary interpretation; clinical validation required.