

CASE SCENARIO: TEMPOROMANDIBULAR JOINT

JN is a 27-year-old college student who fell on his right side and hit his jaw on the ground. JN complains of pain in the right side of his face and jaw area. The pain is constant, 3-7/10 in intensity, worse during eating and chewing. JN's mouth opening is 30 mm, with deflection to the right side. Lateral excursion is 10 mm to the right side and 6 mm to the left side. He also reports reciprocal clicks during mouth opening and closing.

1. What is your preliminary hypothesis for JN's condition?
 - a. Myofascial Pain Disorder Syndrome.
 - b. anterior displaced disk with reduction.
 - c. anterior displaced disk without reduction.
 - d. condylar fracture.

2. Which of the following should be the first step of physical therapy treatment for this patient?
 - a. heat, ultrasound, massage, and mobilization to relieve symptoms.
 - b. education regarding posture, tongue resting position, soft diet, and proper stretching exercise.
 - c. isometric exercise to stabilize the temporomandibular joint.
 - d. deep breathing exercise to relax the masticatory muscles.

After a few weeks of physical therapy intervention, JN has improved in his temporomandibular joint motion: mouth opening to 40 mm, lateral excursion is 10 mm to the right and 8 mm to the left. However, he still experiences intermittent reciprocal clicks with an occasional "catching" sensation.

3. At this time, which of the following exercises will you introduce to JN for the stabilization of his anteriorly displaced disk?
 - a. tongue controlled opening exercise.
 - b. isometric exercise for temporomandibular joint.
 - c. condylar remodeling exercise.
 - d. isometric exercise for cervical spine.

4. If you were going to recommend a splint for JN to use at night, what would be the most appropriate option?
 - a. stabilization splint.
 - b. anterior repositioning splint.
 - c. nociceptive trigeminal inhibition-tension suppression system splint.
 - d. sport splint.

ANSWERS

1. The correct answer is **b. anterior displaced disk with reduction**. The limited opening, the deflection to the involved side, the limited excursion to the contralateral side, and the reciprocal clicks, all make this diagnosis the most likely.
2. The correct answer is **b. education regarding posture, tongue resting position, soft diet, and proper stretching exercise**. While modalities and mobilization may be indicated, it is more important initially to instruct patient in proper self-management to control his symptoms.
3. The correct answer is **c. condylar remodeling exercise**. Condylar remodeling exercise is designed to relocate the anteriorly displaced disk and stabilize the structure.
4. The correct answer is **b. anterior repositioning splint**. This type of splint is recommended for an anteriorly displaced disk with reduction. A stabilization splint is more for myogenous TMJ disorder. The nociceptive trigeminal inhibition-tension suppression system splint is not recommended due to its controversial side effect. There is no evidence to support the use of a sport splint.