

# 경추 신경근병증에 대한 전방 터널링 수술 : 초기 32례에 대한 보고

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= Abstract =

## Anterior Tunnelling Operation for Cervical Radiculopathy : A Report of First 32 Cases

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**Objectives** : Anterior tunnelling technique consist of anterior cervical fractional interspace decompression without fusion. This method provides sufficient space for adequate neuroforaminal decompression but avoids the need for fusion or fixation. We report early clinical results of 32 cases that underwent anterior tunnelling operation for treatment of cervical radiculopathy.

**Methods** : This method is identical to conventional approach until the exposure of anterior cervical body and bilateral retraction of longus colli is made. A vertical window is then made at the vertebral bodies and disc space lateral to the insertion site of the longus colli. The window is deepened with drilling that follows a tunnelling fashion down to the compressive lesion. We analyzed clinical results from 32 patients who treated between December 1998 and August 2000.

**Results** : Satisfactory results were obtained in 87% of the patients. Two patients required revision surgery. None revealed surgical spinal instability on last follow - up.

**Conclusion** : Anterior tunnelling operation is an acceptable surgical option for the treatment of cervical radiculopathy. Its advantages are short hospitalization, minimal postoperative discomfort, and technical feasibility.

**KEY WORDS** : Cervical · Tunnelling · Anterior approach.

## 서 론

Cloward<sup>2)</sup>가 1950

가

가

1)3-6)10)

가

가

7)8)11)12)

5)

5)

<sup>9)</sup>(fractional inters-

pace decompression)

32

## 방 법

### 1. 임상자료 및 방법

1998 12 2000 8

가 MRI 4

excellent,

2

good,

1

fair,

poor

가 2

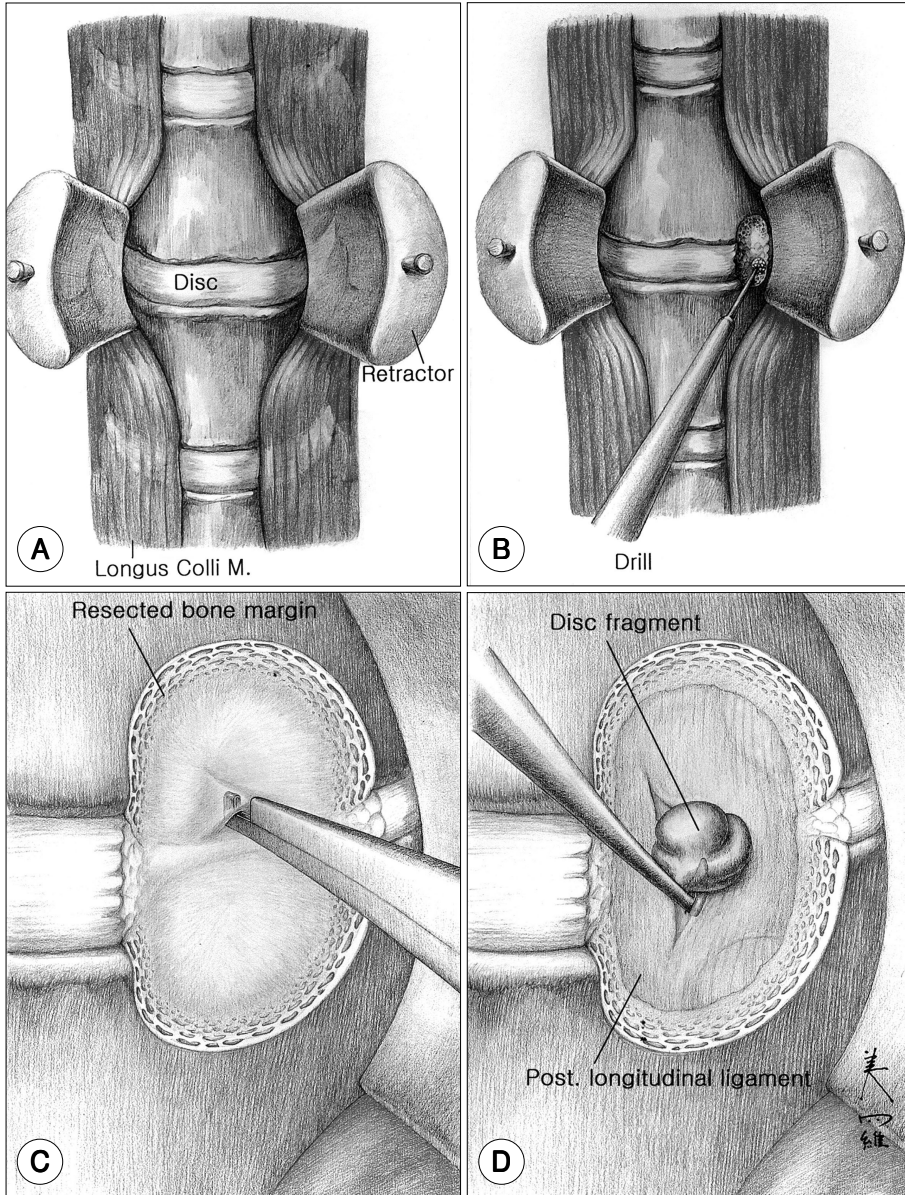
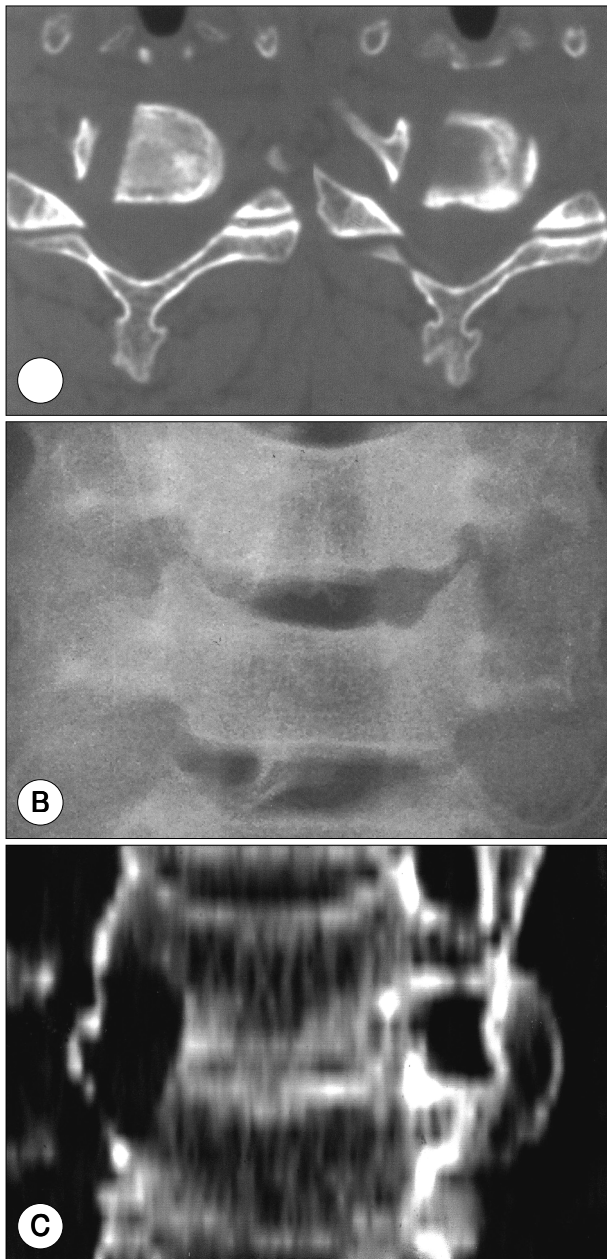


Fig. 1. Artist's illustrations of the anterior tunnelling operation. A : Bilateral longus colli retraction is done after the exposure of anterior vertebral surfaces. B : Bone resection is started at the interspace lateral to the attachment line of the longus colli. C : Posterior annulus is removed using 1mm Kerrison rongeurs. D : A disc fragment can be found beneath the annulus or posterior longitudinal ligament.

2. 수술수기



**Fig. 2.** A : A typical example revealing the tunnelling trajectory and the extent of bone resection. B : A soft disc herniation can be treated through small tunnel. C : A cervical spondylotic spur needs wider margin of bone resection.

1/3, 2/3  
4cm

C - arm

longus muscle

Cloward

(Fig. 1A).

muscle

4mm

longus

5mm

4mm,

(Fig.

1B).

가 3mm

가

가

가

가

(Fig. 2).

Avitene

1mm Kerrison punch

(Fig. 1C).

(Fig. 1D).

1mm

Kerrison punch

가

가

가

Avitene

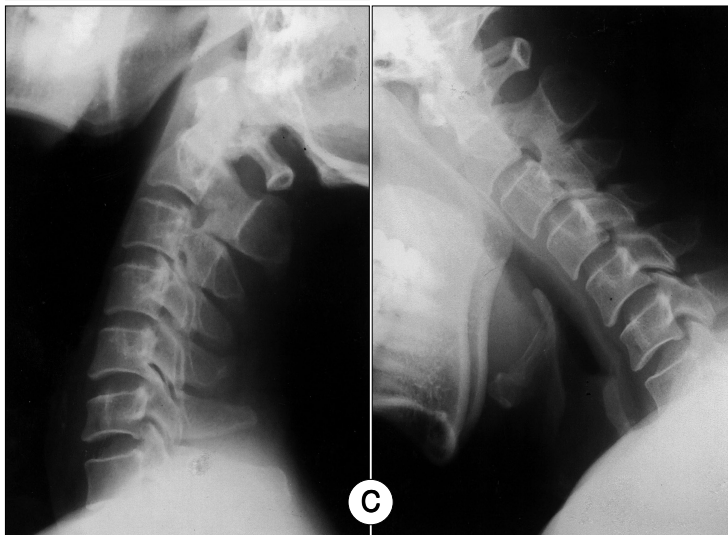
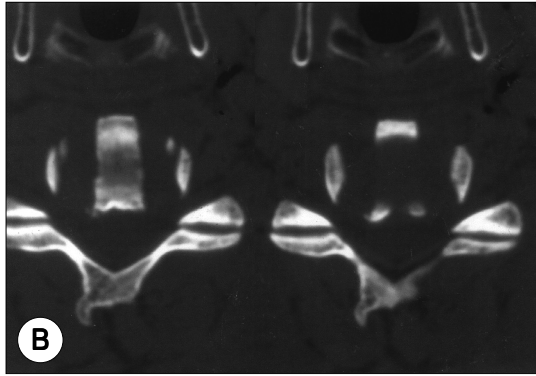
가 3mm

6mm가

가



**Fig. 3.** A 36-year-old man with bilateral C6 radiculopathies. A : preoperative parasagittal cervical MRI showing bilateral spondylosis and bony spurs at C5-6 level. B : Postoperative axial CT showing the extent of bony resection. C : Postoperative stress view showing no instability of the cervical spine.



결 과		excellent가 8 , good 17 , fair가 4, poor가 1	
1998	12	2000	8
가 27 ,	가 5	32	21
14 ,	18	44.4	1
20	가	6~7	2
5~6	6~7	9 ,	4 , 2
~ 1	1	26	5 , 5
1	5~6	가 2 , 7	7
( : 6~26 ) ,	2	13	3
2			1~2mm

### 고찰

1)2)5)9). 1980

가

10).

가

50%

가

2

가

6). 1996 Jho<sup>5)</sup>

CT

가

가

가

83%  
87%가

good

excellent

가

가

2.75

### 결론

1988 Snyder Bernhardt<sup>9)</sup>가  
longus

colli

32

가

가

- : 2001 1 12
- : 2001 5 7
- :

158 - 710

911 - 1

. Jho

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5).

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