

혈액투석 중인 만성 신부전증 환자에서의 불면증에 대한 연구

Insomnia in Patients with Chronic Renal Failure on Hemodialysis

김경률¹ · 양창국¹ · 한홍무¹Gyung-Ryul Kim,¹ Chang-Kook Yang¹ and Hong-Moo Hahn¹

■ ABSTRACT

Objectives: The purposes of this study were to investigate 1) the incidence of insomnia, 2) the clinical characteristics of the insomniacs, 3) the correlation of severity of insomnia with somatic complaints and psychological distresses, and 4) the beliefs and attitudes about sleep in patients with chronic renal failure on hemodialysis.

Methods: The author evaluated 153 patients, receiving hemodialysis therapy at the four outpatients hemodialysis units in Pusan, Korea. The patients had completed a self-administered questionnaire package, which consisted of basic demographic findings, questions characterizing insomnia, Beck Depression Inventory(BDI), Spielburger's State-Trait Anxiety Inventory(STAI), and visual analogue scales measuring quantitatively the severity of the self-perceived psychological and somatic symptoms. And several laboratory data were collected. Diagnosis of insomnia was made in the base of insomnia criteria of DSM-IV and international classification of sleep disorders. Subjects were dichotomized into those who reported any characteristics of insomnia or those who had no insomnia during the preceding two weeks.

Results: Insomnia was found in 100(65.4%) of 153 patients. No statistical differences were found between the patients with and without insomnia in terms of age, gender, education, marital status, mean duration of hemodialysis and all considered laboratory findings except serum albumin. The patients with insomnia had significantly higher BDI score and predialysis systolic blood pressure, and lower serum albumin as compared to non-insomnia group. Significant differences were found between two groups in terms of self-perceived distress such as sadness, anxiety, worry, pruritus, and dysfunction of daily life. The data showed statistically significant correlation between insomnia severity and some variables such as physical dysfunction, pruritus, bone pain, sadness, anxiety, worry, dysfunction of daily life and excessive daytime sleepiness. The patients with insomnia had significantly several dysfunctional beliefs and attitudes about sleep than those without insomnia.

Conclusion: These results indicate that insomnia is very common in hemodialysis patients and likely contribute to the impaired quality of life experienced by many these patients. The author suggests that physical and psychological distresses would be reduced and the quality of life could be improved if their sleep disturbances are properly ameliorated in patients on hemodialysis.

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Key words: Chronic renal failure · Hemodialysis · Insomnia.

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연구대상 및 방법

1. 연구대상

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1) 수면관련 설문지

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Morin(17) 1. 본 연구 대상군의 인구통계학적 특징
 30 153
 VAS , 46.5(18 73) , 가 87 (56.9%)
 가 66 (43.1%) . 48.1(1 220)
 70.2% , 10.5
 (18)(Sleep Disorders Questionnaire) 51.9%가 ; 46.6%가 ;
 12 , 1.5%가 (Table 1).
 / 9

2) 백 우울증 척도(BDI) 1) 두 군간의 인구통계학적 비교
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 21 . BDI 153 100 (65.4%)
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3) 스피이버거 상태-특성 불안 척도(STAI) 44.8 , 54.3
 STAI 40 가 (Table 2).
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4. 통계처리 3) BDI와 STAI 점수의 비교
 SAS (version 6.12) student t - 가 (p<0.001), STAI
 가 (Table 2).

Table 1. Demographic characteristics of subjects

	Subjects (N = 153)	
	N(%)	Mean ± SD
Age(years)		46.5 ± 13.0
Gender(male/female)	87(56.9%)/ 66(43.1%)	
Marital status(married/others)	106(70.2%)/ 47(29.8%)	
Education(years)		10.5 ± 3.9
Socioeconomic status(high/middle/low)	2(1.5%)/ 62(46.6%)/ 69(51.9%)	
Duration of dialysis(months)		48.1 ± 44.3

Table 2. General comparison of insomniacs and non-insomniacs

	Insomniacs(N = 100, 65.4%)	Non-insomniacs(N = 53, 34.6%)
Age(years)	46.9 ± 12.9	45.7 ± 13.4
Gender(male/female)	56(56.0%)/ 44(44.0%)	31(58.5%)/ 22(41.5%)
Marital status(married/others)	65(66.3%)/ 33(33.7%)	41(77.4%)/ 12(22.6%)
Occupation(jobless/housewife/others)	52(53.1%)/ 21(21.4%)/ 25(25.5%)	46(46.9%)/ 14(27.5%)/ 16(25.6%)
Socioeconomic status(high/middle/low)	2(2.3%)/ 39(43.8%)/ 48(53.9%)	0(0%)/ 23(52.5%)/ 21(47.7%)
Education(years)	10.1 ± 4.1	11.4 ± 3.3
Duration of dialysis(months)	44.8 ± 39.1	54.3 ± 52.4
Sleep hygiene(good/bad)	43(43.0%)/ 57(57.0%)	27(50.94%)/ 26(49.1%)
Beck Depression Inventory	25.2 ± 10.8	18.5 ± 9.6***
State Anxiety Inventory	42.2 ± 6.8	41.0 ± 6.9
Trait Anxiety Inventory	45.5 ± 8.9	43.1 ± 9.1
Predialysis BP(mmHg)	161.7 ± 22.2/ 91.0 ± 13.3	152.7 ± 25.4*/ 88.6 ± 11.4
Serum albumin(gm/dl)	3.8 ± 0.5	4.0 ± 0.3**

*p<.05, **p<.01, ***p<.001

Table 3. Subjectively estimated self-perception using visual analogue scales

Self-perception	Insomniacs (N = 100)	Non-insomniacs (N = 53)	p value
Sadness	46.5 ± 31.0	25.6 ± 29.0	0.000
Anxiety	49.1 ± 29.0	27.8 ± 27.5	0.000
Worry	63.2 ± 26.2	45.4 ± 35.1	0.002
Physical dysfunction	52.5 ± 21.9	47.1 ± 24.4	0.166
Pruritus	49.0 ± 32.6	31.2 ± 30.0	0.001
Bone pain	38.0 ± 33.4	29.8 ± 33.4	0.152
Dysfunction of daily life	43.5 ± 33.7	12.2 ± 17.5	0.000
Daytime sleepiness	45.2 ± 23.3	37.6 ± 26.7	0.072

Mean values for visual analogue scales could be ranged from 0(min) to 100(max).

Table 4. Pearson correlation of insomnia severity and some variables

	r	p value
Sadness	.326	0.001
Anxiety	.363	0.000
Worry	.272	0.003
Physical dysfunction	.254	0.005
Pruritus	.366	0.000
Bone pain	.280	0.005
Dysfunction of daily life	.646	0.000
Daytime sleepiness	.394	0.000

4) 혈액화학검사 소견의 비교

(161.7/91.0 mmHg vs 152.7/88.6 mmHg, p<0.05), 가 (3.8g m/dl vs 4.0 gm/dl, p<0.01)(Table 2).

3. 심인적, 신체적 증상의 비교

VAS (p<0.001), (p<0.001), (p<0.005)

(p<0.001),

가 (p>0.05).

(p<0.001)(Table 3).

4. 불면증 정도와 신체 및 심인증상의 상관관계

(r = .254, p = 0.005), (r = .366, p<0.001), (r = .280, p = 0.005), (r = .326, p = 0.001), (r = .363, p<0.001), (r = .272, p<0.005)

(r = .646, p<0.001)

(r = .394, p<0.001)

가 (Table 4).

5. 수면에 대한 믿음과 태도 비교

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(p<0.

Table 5. Some selected beliefs and attitudes about sleep

Beliefs and attitudes about sleep	Insomniacs(N = 100)	Non-insomniacs(N = 53)	p value
When I have trouble getting to sleep, I should stay in bed and try hard.	67.1 ± 27.5	55.2 ± 32.1	0.029
I am worried that I may lose control over my ability to sleep.	52.0 ± 29.5	39.3 ± 31.1	0.040
Because I am getting older, I should go to bed earlier in the evening.	43.7 ± 29.1	31.1 ± 29.1	0.043
When I have a good night's sleep, I know that I will have to pay for it on the following night.	36.4 ± 30.1	16.6 ± 19.1	0.001
When I sleep poorly on one night, I know it will disturb my sleep schedule for the whole week.	44.1 ± 30.1	25.7 ± 28.3	0.006
I can't ever predict whether I'll have a good or poor night's sleep.	53.1 ± 32.3	38.7 ± 31.6	0.031
I have ability to manage the negative consequences of disturbed sleep.	45.2 ± 29.7	64.7 ± 26.8	0.000
I get overwhelmed by my thoughts at night and often feel I have no control over my racing mind.	57.9 ± 29.1	39.4 ± 31.5	0.002
Medication is probably the only solution to sleeplessness.	41.7 ± 30.4	28.8 ± 25.5	0.031

Score, which could be ranged from 0(min) to 100(max), was measured by visual analogue scales.

°Adapted and selected from reference 17.

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요 약

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153 (87 , 66)

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중심 단어 :

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