Table 2 Linear regression analysis for predictor variables of happiness, Kerman, 2016

Variable	Score of happiness	Diff	Cı	Crude		Adj	usted
			P-value	95% CI	Diff	P-value	95% CI
Age	_	0.05	0.190	-0.03; 0.13	0.09	0.058	-0.003; 0.19
Religion	_	0.72	< 0.001	0.51; 0.93	0.58	< 0.001	0.38; 0.78
Sex		0.72	(0.001	0.51, 0.95	0.50	( 0.001	0.30, 0.70
Male	42.71	-	_	_	_	_	_
Female	43.71	-0.98		-2.94; 0.98			
Level of education	42.73	-0.98	0.327	-2.94, 0.98			_
Illiterate	25.01						
	37.01	- 2 %0	- 495		-	- 0.905	
< High school	39.81	2.80	0.487	-5.09; 10.68	-0.46	0.895	-7.32; 6.40
High school diploma	42.56	5.55	0.156	-2.13; 13.23	2.51	0.081	-3.11; 5.31
University	44.87	7.86	0.043	0.25; 15.47	3.20	0.025	0.41; 5.98
Employment status							
Unemployed	35.22	-	-	-	-	-	-
Housewife		5.04	0.026	0.60; 9.47	4.36	0.039	0.21; 6.51
Student	43.77	8.55	< 0.001	4.17; 12.92	5.32	0.009	1.34; 9.30
Employed	44.75	9.52	< 0.001	5.51; 13.53	6.30	0.001	2.57; 10.03
Retired	46.14	10.92	< 0.001	5.52; 16.31	6.32	0.021	0.94; 11.70
Marital status							
Divorced/ widowed	35.88	-	-	-	-	-	-
Single	43.12	7.24	0.002	2.72; 11.76	4.07	0.066	-0.27; 8.4
Married	43.99	8.11	< 0.001	3.68; 12.55	4.10	0.042	0.15; 8.05
Living in a deprived area							
No	44.25	-	-	-	-	-	-
Yes	38.97	-5.28	< 0.001	-7.74; -2.28	-2.95	0.010	-5.19; -0.7
Income (US\$ per month)							
> 750	49.66	-	-	-	-	-	-
450-750	44.19	-5.47	< 0.001	-8.47; -2.47	-3.70	0.008	-6.41; -0.9
150-450	41.14	-8.52	< 0.001	-11.30; -5.47	-6.38	< 0.001	-8.96; -3.6
< 150	39.88	-9.78	< 0.001	-13.20; -6.36	-3.13	0.064	-6.46; 0.18
Health status							
Weak	26.11	-	-	-	-	-	-
Moderate	34.94	8.83	0.002	3.29; 14.37	4.80	0.081	-0.50; 10.19
Good	43.15	17.03	< 0.001	11.70; 22.37	10.24	< 0.001	4.92; 15.56
Excellent	53.40	27.29	< 0.001	21.77; 32.80	19.34	< 0.001	13.76; 24.8
Chronic disease							
Yes	39.62	-	-	-	-	-	-
No	43.65	4.02	0.018	7.35; 0.70	_	_	_
Stress level							
High	34.98	_	_	-	_	-	_
Moderate	39.38	4.40	0.010	1.04; 7.77	3.14	0.049	0.04; 6.28
Low	45.79	10.81	< 0.001	7.57; 14.06	6.21	< 0.001	3.08; 9.34
No	53.83	18.85	< 0.001	14.51; 23.19	11.77	< 0.001	7.63; 15.89
Living situation	J3.03	10.03	V 0.001	17.31, 23.19	11.//	( 0.001	7.03, 13.09
Alone	27.00	_					
	37.99		0.200	2.06/10.19	_		-
With friends	41.10	3.11	0.388	-3.96; 10.18	-	_	_
With family	43.56	5.57	0.010	1.32; 9.83	-	-	-
Physical activity							
Low	40.18	-	-	-	-	-	-
Moderate	43.26	3.07	0.038	0.17; 5.97	-	-	-
High	44.56	4.38	< 0.001	1.98; 6.77	-	-	

Table 2 Linear regression analysis for predictor variables of happiness, Kerman, 2016 (concluded)

Variable	Score of happiness	Diff	Crude		Diff	Adjusted	
			P-value	95% CI		P-value	95% CI
Alcohol use							
Yes	43.11	-	-	-	-	-	-
No	43.28	0.16	0.915	-3.13; 2.81	-	-	-
Tobacco use							
Yes	42.21	-	-	-	-	-	-
No	43.53	1.32	0.275	-1.05; 3.69	-	-	-
Addiction							
Yes	38.07	-	-	-	-	-	-
No	43.58	5.51	0.007	1.48; 9.55	-	-	-

Dif = difference; CI = confidence interval.

people. Although the results of a national survey in Iran showed that single people had higher happiness than married people (11), most studies revealed that marriage is associated with a higher happiness level and divorced and widowed people had the lowest the score of happiness (24,26). In a national cohort of Thai adults, married people had a higher LoH than single people and single people had a higher LoH than divorced or widowed people (26). The effect of marital status on happiness was minimal among older women and maximal among younger men. The reason for this is that married people have healthier lifestyles and better health status than single people. Also, married people have better support systems than others, especially divorced and widowed people.

#### **Employment status and happiness**

Our research revealed that unemployment was a significant factor associated with low LoH. The retired and employed people had 6.32 and 6.30 higher LoH respectively than unemployed people. The results of a national survey showed that unemployed people had the lowest LoH in the Islamic Republic of Iran (11). Many studies have shown that unemployment can reduce happiness (26–28). Unemployment can lead to unhappiness through poverty, crime, mental illness, feelings of worthlessness and bad decision-making.

## Income and happiness

One of the most important factors affecting happiness is income deprivation (11,24,25,29). Our data also revealed that a middle level of income has an association with unhappiness. It seems that people with middle levels of income are always worried about poverty. They also compare themselves to rich people and try to increase their levels of income. This leads to increased anxiety and unhappiness in this group.

## Health status and happiness

Our findings indicated a strong positive relationship between health and happiness. People with an excellent health status had on average 19.34 (95% CI 13.76–24.85) higher LoH compared with those with poor health status. Several other studies have shown that health status is one of the most important factors affecting happiness

(11,24,30). People with low levels of health are unable to achieve their goals. Thus, their LoH goes down.

#### Stress and happiness

In this study, there was a significant inverse relationship between stress and happiness. Individuals who did not have stress had an 11.77 (95% CI 7.63–15.89) higher LoH than individuals with a high level of stress. Based on results of other studies, not only does increase in stress levels reduce feelings of happiness significantly, but the frequency of depression, anxiety, drug addiction and suicide are also higher in people with insufficient LoH and life satisfaction; this group is also likely to have higher mortality rates (5,8). High levels of stress lead to a lack of compliance with new conditions and thus, reduce LoH. Stress is also a major risk factor for communicable and noncommunicable diseases and can lead to reduced LoH through disease.

# Living in deprived areas and happiness

This study found that living in deprived areas is an important factor in low happiness. A number of studies have shown that people living in deprived areas experience less happiness (31,32). Social deprivation, poor health status and lack of access to urban facilities in deprived areas have led to low LoH in people living in these areas.

#### Religion and happiness

This study found a significant positive correlation between religious attitude and behaviour and happiness. A unit increase in the religion score led to an increase of 0.58 in the happiness score. Previous research conducted in Muslim societies corroborates this relationship (33), but the results of another Iranian study revealed that dogmatism, especially religious dogmatism, had negative effects on LoH (13). Religious beliefs lead to spiritual relaxation and increased happiness. Also, organized religious practices lead to an increase in happiness through an increase in social engagement.

### Sex and happiness

There was no significant association between sex and LoH. Other studies have shown inconsistent results. In most studies happiness was higher in men than in women (11,21). In some studies, there was no significant relation-