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FREQUENCY OF ACTIVITY IN DIFFERENT SPORTS OF SLOVENIAN ADULTS OVER A ONE-YEAR PERIOD

POGOSTNOST UKVARJANJA ODRASLIH PREBIVALCEV SLOVENIJE Z RAZLIČNIMI ŠPORTNIMI AKTIVNOSTMI V OBDOBJU ENEGA LETA

Abstract

The study was conducted on the basis of a survey of October 2000 aimed at discovering what sports the adult population of Slovenia did in the past 12 months and how frequently. The sample of 1,100 adults (over 18 years of age, average age 45.38) consisted of 524 males (47.6%) and 576 females (52.4%). Data were compared between the active and inactive study subjects in terms of their sports activity, and the ratio was 45% to 55%. Sports activity was reported by 55% of all men included in the study and by only 36% of women. Slovenian adults prefer walking & strolling, swimming, cycling, mountaineering, alpine skiing, dancing, jogging, morning exercises, badminton, basketball, soccer and fitness. In terms of frequency of sports activity in one year, a small part of the sample consisted of the subjects practising a specific sport on a regular basis and/or also for competitive purposes. On the other hand, a large part of the sample consisted of subjects engaging in a specific range of sports activities on a frequent basis. Gender and age were shown to be significant with respect to frequency of practice and selection of sports activities.

Key words: sports activity, adults, frequency, sports disciplines, gender, age

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Izvleček

Študija je bila opravljena na podlagi anketiranja, izvedenega oktobra 2000 s ciljem ugotoviti, s katerimi športi in kako pogosto so se odrasli Slovenci ukvarjali v zadnjih 12 mesecih. V reprezentativni vzorec je bilo zajetih 1100 odraslih prebivalcev Slovenije, starih 18 let in več, s povprečno starostjo 45,38 let, med katerimi je bilo 524 (47,6 %) moških in 576 (52,4 %) žensk. Z različnimi športnimi aktivnostmi se je ukvarjalo 45 % anketiranih. Od tega je bilo 58,2 % moških in 41,8 % žensk. Glede na celoten vzorec je bilo aktivnih 55 % moških, žensk pa 36 %. Športne aktivnosti, s katerimi se ukvarja največ odraslih prebivalcev Slovenije, so hoja, plavanje, kolesarstvo, planinstvo, alpsko smučanje, ples, tek v naravi, jutranja gimnastika, badminton, košarka, nogomet in fitnes. Glede na pogostnost športne aktivnosti (tj. kolikokrat v 365 dneh) smo ugotovili, da se z ene strani z nekaterimi športnimi dejavnostmi ukvarja razmeroma majhen delež anketiranih, vendar so pri tem aktivni zelo redno in/ali tudi tekmovalno, z druge strani pa tudi veliko pogostost določenih športnih aktivnosti, s katerimi se pogosto ukvarja večji delež anketiranih. Tako izbor športov kot pogostnost udejstvovanja sta pomembno odvisna od spola in starosti.

Ključne besede: športna aktivnost, odrasli, pogostnost, športne panoge, spol, starost

Introduction

Like elsewhere in the world, some of the Slovenian institutions try to monitor recreational sports activity of the entire Slovenian population as attentively and accurately as possible. Physical activity and sports activity were mostly surveyed using various questionnaires to ascertain how the citizens prefer to spend their leisure time, whether it is related to sports and in what way. The aim was also to explore peoples' choice of sports and venues, and establish how frequently they participate in each. Diaries were also used to register sports activity in a certain period of time. Given a variety of methodologies used to collect and analyse data and due to application of different measures and assessment criteria, it is hard to use survey results in a cross-national comparison. In the past decades, attempts were made to solve this problem, for example by Finger (1992) and the project Compass (1999), as both strived to set common criteria for comparative information about adults' sports activity in the European countries. However, so far no satisfactory international guideline for harmonisation have been produced.

For more than thirty years (since 1973) the Faculty of Sport at the University of Ljubljana has systematically studied the recreational sports activity of adults in Slovenia. These studies revealed the situation in the country with respect to frequency of sports activity of adult population (organised and non-organised) in relation to their socio-demographic characteristics, such as gender and age, level of education and income, and living environment (village, town). At the same time, these surveys dealt with preference for specific sports disciplines and the proportion of Slovenians practising a particular sport.

The goal of the present study is to answer the question of what sports Slovenian adults prefer doing and how frequently they do it in a one-year period. The survey evaluated the quantity of sports activity based on the number of times people took part in sports in 365 days. Once-a-week activity means up to 50 training sports sessions and twice-a-week activity about 100 sports sessions yearly.

With reference to frequency of participation, we can distinguish between those sports on which weather has no impact and those sports which are strongly influenced by weather. Additionally, we can make a distinction between the sports where nature and sport surfaces change due to weather conditions. Moreover, there are seasonal sports and sports that are attractive all year round. Various sports on snow in a cold winter have their own characteristics, compared to sports in warm weather, e.g. "blue sports" in the sea (swimming, diving) or on the sea surface (sailing, windsurfing). There are also sports with relatively no seasonal boundaries but dependent on the weather conditions, i.e. cycling, walking & strolling, mountaineering, inline skating, trim-track running etc. They are attractive throughout the year, but still far more exercised during warmer seasons. All sports mentioned above are "outdoor activities" and can be supplemented by those in the open air requiring sport facilities and special sport surfaces, e.g. tennis, soccer, badminton and beach volley. Many sports do not belong to the weather-sensitive group. They take place in sports halls or indoor sports courts, such as table tennis, badminton, squash, basketball, volley ball, aerobics, fitness activities, morning exercise and other.

The surveys in Slovenia mostly covered measuring of frequency of sports activity and discovering what sports people practice during a year (Jošt, Sila, Leskošek. Tušak, Doupona Topič, Cecić

Erpič, & Močnik, 1999; Petrović, Sila, Ambrožič, & Žvan, 1980 ; Petrović, Ambrožič, & Sila, 1990 ; Petrović, Ambrožič, Sila, & Doupona, 1998 ; Petrović, Ambrožič, Sila, Doupona Topič, & Bednarik, 2000 ; Petrović, Ambrožič, Bednarik, Berčič, Sila, & Doupona Topič, 2001; Pišot & Sila, 2000 ; Sila & Ambrožič, 1997).

The Compass project classifies sports activity according to the following criteria: frequency indicates *quantity* (none / occasionally: 1–12 times a year, irregularly: 12–69 times a year, and intensive: more than 120 times a year), while *quality* is explained by whether the activity is competitive or not, and by what range or type of competitions the participants take part in (recreational, local, regional, high-level competition etc.). The third criterion deals with organisation of sports activity which is defined as taking part in organised exercises and as sport club membership.

The Australian researchers Dale and Ford (2002 ; the sampled subjects aged over 15) used a 6-level scale measuring frequency of sports activity in a year; 1–6 times, 7–12, 13–26, 27–52, 104 and more times. The survey included 165 leisure time activities, and in terms of number of participants, walking and strolling, swimming, fitness, aerobics, cycling and tennis were on top of the list.

Most surveys investigate sports activity within a country and/or among several countries during a one-year period (Booth, 2000 ; Cordell, McDonald, Lewis, Miles, Martin, & Bason, 1996; Zuzanek, 1996). One of the UK studies (Gratton & Tice, 1994) examines sports activity in past 4 weeks, while IPAQ (International Physical Activity Questionnaires, 2004), launched in Geneva in 1998 is an exception to the rule, as its questionnaire measured sports activity in past 7 days.

For decades, the SGMA (Sporting Goods Manufacturers Association, USA, founded in 1907) has conducted research investigating sports activity in the American population. While they may complement various consumer, point-of-sale and retail trade studies, data on participation have also become more and more important in defining the size of a market. In the 2002 survey (the sample includes more than 15 thousand households and respondents over 5 years), 103 various sports and fitness activities were documented (Sporting Goods Manufacturers Association, 2004). In a multitude of sports activities that the American citizens were fond of were: (1) walking and strolling, (2) swimming, (3) cycling, (4) bowling, (5) various kinds of fishing, (6) strength exercises – free weights, (7) treadmill, (8) stretching, (9) basketball, and (10) jogging. Not only was the popularity of sports measured, but also the frequency of activity in each sport during the past year (sporting Goods Manufacturers Association, 2004). One of the interesting results was that at least 100 training sessions in the past year were performed by 33% of free-weight lifters, 38% of treadmill users, 44% of those engaged in stretching, and by 29% of joggers.

In the last fifteen years a faster growth in the number of participants was recorded in the population doing various fitness exercises, especially cardio fitness (fitness cycling, treadmill, orbitrek etc.), inline skating, mountain biking, snowboarding, kayaking, surfing and diving. In the same period, some sports lost their high attractiveness, such as aerobics, badminton, roller skating – 2x2 wheels, cross-country skiing and water skiing.

The USA survey conducted by Howard (1992) introduced specific criteria for measuring frequency of sports activity. Participation in sports activity was characterised as highly-repeated versus casual or rare; the respondents were differentiated not only on the basis of

their reported participation rate but also in relation to sport. By their annual average rate of participation in sports activity, the respondents were divided in heavy, medium and light categories. Adults who reported activity of 1–19 times in aerobics, jogging and fitness (free weights, weight resistance machines) during the previous 12 months were commonly referred to as *light*; *medium* was defined by a frequency of 20–99; and *heavy* as at least 100 times a year. In contrast, golf and tennis were adjusted differently: the term *light* was defined as 1–4 times a year, *medium* 5–19, and *heavy* 20 or more times a year (Howard, 1992). Various definitions of frequency of sports activity as an interesting methodological issue have often been discussed by many authors, such as Booth, (2000), Cuchman, Veal and Zuzanek (1996).

This survey tries to highlight some characteristics of the frequency of participation in sport by adults, taking into account sports activities that are popular or preferably chosen by the Slovenian adults. The main point is to establish which sports have the highest frequency rate and whether this frequency rate is determined by gender and age.

Method

Participants

The research used a sample of 1,100 adults aged over 17.

Instruments

The questionnaire was provided in the framework of a public-opinion research carried out by the Institute of the Faculty of Social Sciences of the University of Ljubljana. As regards the goal of the research, some parts of the comprehensive questionnaire were taken into consideration separately, according to the following variables: the participation in various sports activities, the frequency of sports activity in the previous year, gender and age.

Procedure

Data were analysed by the SPSS and EXCEL. Basic statistical procedures were used to interpret the selected results, however, some relations between variables were calculated by Pearson's correlation coefficient.

Results

The first table comprises the results obtained from answers by all of the sampled respondents.

In all other presentations of results, only those respondents participating in sports activities in the past year were taken into consideration. Table 1 shows some characteristics of the total sample and of two sub-groups: those respondents who reported sports activity and those who reported to be inactive.

A relatively strong correlation (0.82) was established between men and women in the active group of the sample, taking into account the data on all 50 listed sports and considering the fact that 30 sports out of 50 originally listed in the questionnaire were suitable in terms of information needed for the purposes of this survey.

Table 1: Some characteristics of the total sample and some characteristics of both: active and inactive sub-sample

Characteristic	*All*	*%*	*Active*	*%*	*Inactive*	*%*
Frequency	1100	100	495	45	605	55
Male	524	47.6	288	55	236	45
Female	576	52.4	207	36	369	64
Age - mean	45.4		38.2		51.4	
a) younger (18-40 years)	477	43.6	288	60	189	40
b) older (40+ years)	623	56.4	207	33	416	67
Mean of age – younger	29.1		28.2		30.6	
Mean of age – older	57.8		51.7		60.9	

Table 2: The percentage of active representatives of the sample – the rank of chosen sports by gender

MALE		*%*	*FEMALE*		*%*
1.	Walking & strolling	34.4	1.	Walking & strolling	27.4
2.	Swimming	25.0	2.	Swimming	20.3
3.	Cycling	22.5	3.	Cycling	18.1
4.	Soccer	19.1	4.	Mountaineering	13.9
5.	Alpine skiing	18.9	5.	Aerobics	12.3
6.	Mountaineering	17.7	6.	Dancing	11.8
7.	Basketball	15.5	7.	Morning gymnastics	11.6
8.	Running	11.6	8.	Badminton	10.2
9.	Dancing	10.7	9.	Running	9.4
10.	Fitness	10.5	10.	Alpine skiing	8.2
11.	Mountain biking	9.5	11.	Volleyball	6.9
12.	Table tennis	9.4	12.	Fitness	5.2
13.	Badminton	8.8	13.	Inline skating	5.2
14.	Morning gymnastics	8.4	14.	Ice skating	4.7
15.	Volleyball	8.4	15.	Mountain biking	3.5
16.	Tennis	7.4	16.	Archery	3.5
17.	Fishing	6.1	17.	Table tennis	3.5
18.	Alpinism	5.5	18.	Alpinism	2.8
19.	Athletics	5.0	19.	Trim tracks	2.8
20.	Trim tracks	4.4	20.	Athletics	2.3
21.	Bowling	4.2	21.	Cross-country skiing	2.3
22.	Inline skating	3.8	22.	Tennis	2.1
23.	Shooting	3.8	23.	Yoga	1.7
24.	Bowls	3.6	24.	Bowls	1.6
25.	Skating	3.6	25.	Horse-back riding	1.6
26.	Rowing	3.4	26.	Basketball	1.6
27.	Martial arts	3.2	27.	Rafting	1.6
28.	Auto-motor sport	3.1	28.	Rowing	1.2
29.	Underwater sports	3.1	29.	Windsurfing	0.9
30.	Cross-country skiing	2.9	30.	Bowling	0.9

Table 3: Sports disciplines – rank with reference to reported average training sessions during last year

Rank	*Sports activities*	*N*	*%*	*Min*	*Max*	*M*	*SD*
1	Morning gymnastics	111	10.1	2	365	135.5	123.2
2	Walking & strolling	338	30.7	1	500	103.0	104.9
3	Yoga	12	1.1	3	365	94.2	128.6
4	Handball	8	0.7	3	300	87.9	120.4
5	Aerobics	75	6.8	1	300	63.9	66.2
6	Martial arts	20	1.8	1	300	61.3	82.9
7	Fitness	85	7.7	1	360	59.0	72.5
8	Cycling	222	20.2	2	366	58.9	70.0
9	Horse-back riding	20	1.8	1	365	57.2	99.4
10	Athletics	39	3.5	2	365	55.5	90.3
11	Running	115	10.5	1	365	53.3	75.6
12	Soccer	105	9.5	1	400	52.5	75.5
13	Inline skating	50	4.5	1	300	45.4	53.1
14	Other sports	26	2.4	2	200	40.7	40.7
15	Hunting	13	1.2	2	150	37.0	40.6
16	Shooting	24	2.2	1	250	36.8	67.7
17	Mountain biking	70	6.4	1	360	35.5	61.2
18	Sports gymnastics	5	0.5	5	50	31.6	18.4
19	Bowls	28	2.5	1	330	31.4	76.8
20	Basketball	90	8.2	1	150	30.2	29.4
21	Fishing	35	3.2	1	150	29.7	38.2
22	Volleyball	84	7.6	1	200	26.8	31.5
23	Swimming	248	22.5	2	200	25.4	26.5
24	Table tennis	69	6.3	2	150	23.9	26.8
25	Bowling	27	2.5	1	150	22.3	30.0
26	Tennis	51	4.6	1	100	20.7	19.6
27	Dancing	124	11.3	1	200	19.6	28.3
28	Paragliding	5	0.5	1	50	17.4	20.7
29	Squash	7	0.6	2	50	17.3	21.9
30	Mountaineering	173	15.7	1	200	16.9	25.4
31	Alpinism	45	4.1	1	150	16.8	28.9
32	Sport climbing	9	0.8	1	80	16.8	28.5
33	Trim tracks	39	3.5	1	100	15.8	22.9
34	Cross-country skiing	28	2.5	2	50	15.1	12.5
35	Badminton	105	9.5	1	104	15.0	16.8
36	Aviation sports	1	0.1	14	14	14.0	.
37	Underwater sports	21	1.9	1	40	13.8	11.3
38	Alpine skiing	146	13.3	1	50	11.8	9.6
39	Auto-motor sports	16	1.5	1	50	11.3	13.1
40	Orienteering	14	1.3	1	50	10.4	15.4
41	Snowboarding	12	1.1	1	30	9.4	9.0
42	Golf	8	0.7	1	40	8.8	13.2
43	Ice skating	46	4.2	1	90	8.4	14.6
44	Rowing, kayak	25	2.3	1	56	7.3	11.3
45	Ice hockey	8	0.7	2	20	7.3	5.8
46	Archery	4	0.4	2	14	6.0	5.5
47	Windsurfing	9	0.8	1	15	5.7	5.7
48	Tour skiing	6	0.5	2	10	4.5	2.9
49	Sailing	14	1.3	1	10	3.9	2.9
50	Rafting	18	1.6	1	3	1.5	0.6
51	Triathlon	2	0.2	1	1	1.0	0.0

Legend (for tables 3, 4, 5): N = number of participants; % = percentage of sport active respondents out of 1,100; Min = minimum times a year; Max = maximum times a year; M = arithmetic mean in numbers – how many times a year; SD = standard deviation

Table 4 reported the average frequency of activity in each sport separately for men and women in a year. Besides the average value, the lowest and the highest numbers of training sessions in each sports discipline reported for the last 12 months were also shown.

Only those sport disciplines that were reported by more than 5% of respondents involved in the research were taken into consideration. In terms of average frequency of sports activity, the correlation between men and women was 0.60.

Table 4: The rank of sport disciplines by gender

	Male	*Min*	*Max*	*P*		*Female*	*Min*	*Max*	*P*
1	Morning gymnastics	2	365	121.64	1	Morning gymnastics	3	365	144.57
2	Walking & strolling	2	400	84.15	2	Walking & strolling	1	500	124.39
3	Fitness	2	360	71.69	3	Aerobics	1	300	65.75
4	Cycling	3	366	59.79	4	Cycling	2	365	57.83
5	Running	1	365	56.52	5	Inline skating	3	300	55.13
6	Soccer	1	400	54.11	6	Running	1	365	49.63
7	Athletics	2	365	52.15	7	Mountain biking	2	360	39.25
8	Shooting	1	250	41.85	8	Fitness	1	120	35.67
9	Bowls	2	330	35.74	9	Volleyball	2	200	30.85
10	Mountain biking	1	300	34.00	10	Swimming	2	200	27.81
11	Fishing	1	150	32.06	11	Dancing	1	200	19.66
12	Basketball	1	150	31.67	12	Table tennis	2	150	19.15
13	Inline skating	1	120	30.80	13	Trim tracks	3	100	18.25
14	Table tennis	2	100	25.80	14	Tennis	2	100	18.00
15	Swimming	2	200	23.25	15	Badminton	1	104	17.88
16	Volleyball	1	120	23.16	16	Alpinism	1	100	17.75
17	Bowling	1	150	22.27	17	Cross-country skiing	3	50	15.15
18	Tennis	1	60	21.49	18	Mountaineering	1	90	14.01
19	Dancing	1	100	19.63	19	Alpine skiing	1	48	11.60
20	Mountaineering	1	200	19.43	20	Ice skating	1	24	5.85
21	Alpinism	1	150	16.24					
22	Trim tracks	1	100	14.04					
23	Alpine skiing	1	50	11.96					
24	Badminton	1	48	11.26					

As regards age, the sample was divided in two groups; the group of respondents aged up to 40 and the group over 40. In terms of average frequency of sports activity, the correlation between the younger and the older age groups was 0.64.

Table 5: Rank of sport disciplines by age

	Younger – up to 40 years	*Min*	*Max*	*P*		*Older – over 40 years*	*Min*	*Max*	*P*
1	Morning gymnastics	2	365	115.86	1	Morning gymnastics	10	365	167.71
2	Walking & strolling	2	365	98.10	2	Walking & strolling	1	500	110.09
3	Aerobics	1	300	65.50	3	Cycling	3	366	76.52
4	Athletics	2	365	58.60	4	Fitness	2	360	64.64
5	Fitness	1	300	57.86	5	Mountain biking	3	360	59.23
6	Soccer	1	400	56.59	6	Aerobics	10	200	54.73
7	Running	1	365	56.58	7	Bowls	2	330	52.90
8	Cycling	2	300	50.57	8	Running	2	288	42.56
9	Inline skating	3	300	47.67	9	Shooting	1	200	41.60
10	Mountain biking	1	300	30.09	10	Basketball	3	104	39.36
11	Basketball	1	150	28.53	11	Fishing	2	150	38.15
12	Volleyball	1	200	27.03	12	Hunting	2	150	38.10
13	Swimming	2	200	24.54	13	Soccer	3	300	36.91
14	Dancing	1	200	24.18	14	Table tennis	5	100	36.29
15	Table tennis	2	150	19.81	15	Swimming	2	100	27.28
16	Tennis	1	60	18.79	16	Tennis	7	100	26.15
17	Bowling	1	50	17.43	17	Volleyball	2	52	25.45
18	Trim tracks	1	100	16.17	18	Alpinism	2	150	25.33
19	Mountaineering	1	120	14.75	19	Mountaineering	1	200	19.90
20	Badminton	1	104	14.29	20	Badminton	1	40	17.43
21	Alpinism	1	100	13.67	21	Cross-country skiing	2	50	17.27
22	Rowing, kayak	1	56	7.55	22	Alpine skiing	1	40	10.60
23	Ice skating	1	90	7.46	23	Dancing	1	50	10.13

Discussion

For over thirty years the Faculty of Sport has been monitoring sports activity in Slovenia. As has been established by several studies carried out in that long period, the range of sports on top of the list with respect to proportion of the participating population is relatively constant. However, there some changes appeared in the popularity of some sports. Bowling, which once prevailed among popular sports in Slovenia and later trim-track activities and tennis, now tend to be outclassed by some new sports such as inline skating, snowboarding, aerobics, fitness exercises, paragliding and some other currently fashionable sports. Even though data from various partial analyses show the existence of one hundred sports disciplines, this survey's questionnaire relies upon 50 sport disciplines selected on the basis of similar previous researches on sports activity (Jošt et al., 2000; Petrovič et al., 1980, 1992, 1996, 1998, 2001; Sila & Ambrožič, 1997).

The results shown in Table 1 confirm that both gender and age statistically significantly relate to sport participation. The percentage of men taking part in sports activity was higher (55% of the

whole sample) than that of women (only 36%). In the case of the active sub-sample the relation between men and women was 58.2% : 41.8%. The research established a substantial difference in sports activity in terms of age. The active group within the sample is statistically significantly 13 years younger than the rest of the sample doing very little or no sports. This is not surprising, as the subgroup of respondents aged 40 and less differs from the older group significantly, however, the differences within the sub-groups are even more interesting. 60% of members of the young group were sport active and they were a year younger than average, while the group of respondents over 40 (only one third of the sub-group was active), were 6 years younger than average. The effect of age on sports participation was even more evident when comparing the subgroup of active respondents with that of inactive ones.

Table 2 offers a comprehensive overview of the sports activities the Slovenians do most frequently. Some listed sports are equally attractive for both sexes, such as walking & strolling, swimming and cycling. On the other hand, there are some sports men are more likely to participate in than women. Typical men's sports are soccer and basketball, while women's sports are aerobics and dancing.

The frequency of sports activity during a 12-month period for each sport is reported in Table 3. We took into consideration all sport disciplines included in the questionnaire, even those fewer participants expressed interest in. For some of them a relatively high frequency of activity was established even though they are not considered popular sports. These are sports in which participants take part regularly for competitive purposes as well as for daily recreation, to keep fit or maintain basic motor abilities. The highest frequency was recorded in walking & strolling (500 times a year), followed by soccer (400 times a year) – which is more than once a day. Among daily activities morning exercises, yoga, fitness, cycling, horse-back riding, athletics, jogging and mountain biking were pointed out.

More interesting are the results shown in Table 4 explaining the frequency of activity in specific sports during the past 365 days. The results are shown in two columns, separately for men and women. Sports are ranked by average frequency of activity for each gender. On top of the list are the sports both sexes prefer, these being walking & strolling and morning exercise. The average frequency is higher in women, especially when it comes to walking & strolling. It is true that men's activities are dispersed over many different sports, while walking is a favourite recreational activity of women (for some even the only one) and therefore far more frequently performed. Morning exercise is hardly considered to be a genuine sport, however, as a physical activity it was proven to bring disease-preventative benefits. The relatively high position of morning exercise could be explained by people's attitudes and awareness of the importance of exercise for their health, well being and improving or at least sustaining their motor abilities to cope with daily work (Berčič, Sila, Tušak, & Semolič, 2001). Fitness also ranks high in men's column, as does aerobics in women's column. Both are evidently enticing, due to advanced organisation and equipment as well as guidance by instructors (aerobics), despite their relatively high cost. Unavoidable regular activity (more than once a week) to improve physical fitness may bring favourable average results. We may compare these results with those of a USA survey (Sporting Goods Manufacturers Association, 2004) where the average training sessions of free-weight lifting increased by 15% over ten years (1990-2001) (the reported 2001 average was 84 training sessions).

Expansion of aerobics and other fitness activities for women was also described by A. Bunuel (1991) in her sociological research on the Spanish women's lifestyle. Active engagement in sports was shown as a weakening of the traditional family life pattern that predominantly allowed men to enjoy sport and be physically active. The results show that Slovenian people like cycling very much. This sport ranks high, for both men and women (at least once a week). If we subtracted four cold months during winter, the average frequency – twice a week – would probably be more correct. Mountain biking was also considered a favourite sport. In terms of average frequency, it ranked higher on the women's list than in that of men (39 : 34). Inline skating ranks substantially higher in women than in men in terms of average frequency. In fact many more women take part in this sport than men (see Table 2). This is a typical cyclic and aerobic activity, which also seems more convenient for women than sports characterised by physical contacts and rivalry. According to the USA survey of 2001 (www.sgma.com), women performed more inline skating (33 times a year on average) than men, however, about 70% of participants were younger than 18. The differences among men and women in terms of frequency of sports activity are largely due to typically male sports (e.g. soccer) and typically female sports (e.g. aerobics, dancing). This is also proven by the low correlation coefficient of 0.60.

The next predictor used in the research for distinguishing between frequencies of activity in different sports was age. The results are shown in Table 5. So as to avoid excessive reduction of the sample, we divided it into two groups: a group aged between 18 and 40 years and a group over 40. As expected, the relation between age and frequency of activity was evident (the correlation coefficient was 0.64). As shown in Table 5, the older participants are highly positively associated with morning exercise and walking & strolling (much higher average value), while youngsters prefer exciting and competitive sports as well as new, modern sports, evidently because of different motivation and lifestyle. Elder people prefer health-related sports more and enjoy the nature, younger respondents are keen on sports games, competitive activities and currently fashionable sports. Substantial differences were seen, for example, in cycling. It was established that older people were active on a more regular basis (about three times a fortnight) than younger people (once a week).

The elder group also had better results in terms of fitness activities (higher average frequency) which may again be ascribed to their positive attitude towards regular sports and physical activity in general as an important factor of health. The elder group regularly engaged in mountain biking twice as much as the young one. There was no doubt that for both of the age groups regular sports activity was crucial for well being and keeping fit. However, elder people mainly practice sport for health purposes while this is rarely the element of youngsters' motivation.

Conclusion

To summarise the results of the survey it is appropriate to focus on the fact that the bulk of the sample of the Slovenian population (55%) does not take part in any sport or other physical activity from a recreational point of view. Sports activity is strongly related to gender. The percentage of active male population is 55% and female only 36%. Age is another distinguishing factor for sports activity. The young group was ahead, as expected. The average age of the active respondents was 38.2 years, while that of inactive 51.4 years. Some other figures are also worth mentioning. The active group performed 257 sport sessions in the past 365 days on average.

The average of women (288 times a year) is a better result than that of men (234 times a year). As regards the age, the younger group (> 40) reported 288 activities in a year, whereas the older group was active 213 times. The Slovenians investing part of their leisure time in sports activities on average take part in 5.8 different sports. There were no differences between men and women, however, differences were found in both age groups. Younger people took part in 7.1 different sports, while elder people chose on average 3.9 various sports activities.

About 16% of the respondents participate in sports once a week or less, another 16% are active almost twice a week (104 times a year) and 13% up to 156 times. This means that one third of them is active with frequency ranging from three times a week to once daily. The remaining 22% of respondents reported average sports activity of at least once a day. Some general conclusions drawn on the basis of the results from this and some similar previous surveys have to be explained in greater detail to make a reasonable interpretation. Precisely, the reported high average frequency of sports activity (5 times a week) can be explained by the number of various activities of an individual in the same day. Morning exercises could be added to afternoon jogging and evening fitness. The same is true, if one goes to a sports centre by bike, spends an entire afternoon there by taking part in a sports game, then moves to a fitness centre and finally goes to a swimming pool – four different activities in three hours. Therefore, we had to avoid generalisation of results based on the collected numbers of participation in each sport separately and carefully compare the outcomes by using control questions so as to make a valid interpretation. One of the control questions we put in the questionnaire was: how frequently were you active (regardless of the sport discipline). Slightly more than a third of the respondents reported to have participated in sports at least twice a week.

Moreover, the frequency as such does not provide complete information on the quantity of sports activity, because an important component is missing i.e. duration. With an insight into the amount of time one spends participating in sports (daily, weekly) the survey would enable a closer observation and provide a more comprehensive picture of sports activity. The research concluded that the more different sports one knows, the more opportunities he or she can exploit and reach better results regarding frequency of sports activity. Therefore, in exploring various alternatives to increase participation in sport, it would be appropriate to focus on the importance of a better accessibility and availability of sports, especially for young people. Nevertheless, it is believed that some findings could be of particular interest to those responsible for the research and development activities and for their planning of further investigation in the field.

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