# Research on Influence of the Athletic Dance on College Students' Health

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Abstract— The sports dance is mixture of dance, music, clothing, manners and physique together with its elegant sports, sports, art, education across three fields, is one item has the aesthetic value and entertainment value of fitness high comprehensive art. Sports dancing is a popular student favorite exercise, has a certain effect on the prevention and treatment of certain diseases. Therefore, sports dance has positive theoretical value and practical significance to improve the health level of College students. This paper gives analysis of the influence of sports dance on College students. Research shows that, through analysis and comparison, observation and physiology, if some people often and for a long period of time to participate in the sports dance, so it in blood reducing human viscosity, improve fat metabolism, increase serum level and lower the serum density will significantly improve.

Keywords- sports dance, physical, mental health, College Students

#### I. INTRODUCTION

Through the observation and research for one year, we found that the mass sports dance in improving public health especially college students health played an important role. Sports dance can adjust these people's mind and body; we did some physiological analysis, university student health effects on the main processing of sports dance, especially analysis of serum protein and blood density.

# II. RESEARCH OBJECTIVES AND METHODS

# A. The target

The subjects of the experiment were divided into two groups: one group is experiment group, another. group was control group. The experimental group staff consists of 200 college students, they all take part in sports dance and the average age is 20.35 years old. Members of the control group including 200 with the same physical conditions, but not in any physical exercise or activities of the college students, their average age is 21.12 years old.

# B. Method

Physical examination including normal routine medical examination, such as height, weight, blood pressure, heart and ECG.

Serumfive quota test.Using721 spectrophotometer, takenfromthe morning fastingvenous blood fortesting 3fat(TC) serumtotal cholesterol (T-ch), lipoprotein cholesterol highdefinition (hdI-ch), lowdensitydefinition (hdI-ch), lowdensitylipoproteincholesterol, verylow densities (DL-ch), lipoproteincholesterol (TC).

Blood circulation change measurement. Measurements included red blood cell drop rate, red blood cell aggregation and the degree of density of blood.

Data processing. Blood flow detection system is used to test the blood flow changes, so as to find out the various data needed for computer processing, each number represents the average men are Sigma, through the "T" test, some differences can be tested.

# III. CONCLUSION

(a) table 1 shows the influence of sport dance on College Students' serum protein, some changes that often take part in sports dance people can from table 1 reflected by these changes can be seen: the level of HDL-ch of blood has increased significantly, serum TG and TC degree increased slightly. Statistically significant differences between the two sets of data.

(b) From the experimental group can be found in some effect: change the experimental group blood quota cycle significantly better than the control group (Table 2). See in Figure 2: aggregation, in red cell drop rate, blood viscosity and blood reduced degree of index is very obvious. At the same time, statistically significant differences between the two sets of data (P<0.5).

TABLE I. EFFECT OF SERUM PROTEIN, SPORTS DANCE ON COLLEGE STUDENTS. (X+S)

	The test set		Matching control	
	Before the training	After training	Before the training	After training
T-ch	194.13±30.56	193.34±31.62	195.25±32.18	194.02±32.69
HDL-ch	56.16±9.49	63.97±10.07	56.02±10.38	56.31±9.65
LDL-ch	115.48±12.61	101.36±13.25	112.85±13.42	111.90±13.35
TG	137.93±22.18	115.69±20.45	133.25±23.82	131.83±23.02

TABLE II. EFFECT OF SPORTS DANCE, THE BLOOD CIRCULATION OF THE COLLEGE STUDENTS

	The test set		Matching control	
	Before the training	After training	Before the training	After training
Red blood cell	45.85±3.15	44.0±3.64	44.05±30.68	43.93±3.92
Erythrocyte sedimentati on rate (mn/h)	1.76±0.15	1.75±0.16	1.74±0.15	1.75±0.16
Collagen of blood	43.85±3.15	42.0±3.64	43.05±30.68	42.93±3.92
All the blood of the collagen	5.49±0.47	5.21±0.48	5.42±0.49	5.34±0.44
Reconstituted collagen degree	9.86±1.05	9.33±1.12	9.76±1.18	9.83±1.20
The number of blood cells (thousand /mn)	491.05±46.28	488.52±49.05	497.05±46.28	495.25±49.05

#### IV. ANALYSIS

# A. Effect of serum protein of sports dance in the people's

12 months of sports dance training, the After experimental group personnel in the internal body in particular has changed dramatically in five serum quotas, and there is an obvious numerical difference before and after the experiment. Compared with the control group, the difference has statistical significance (P<0.05). Generally

speaking, some medium-sized aerobics can activate the muscle and fat acid operation, cholesterol and phospholipids into high density protein, resulting in serum cholesterol (HDL-CH) concentration is more and more strong, all this causes blood vessels to cholesterol in the liver metastasis and digestion. At the same time, long-term exercise can stop protein cholesterol (VLDL-ch) in the liver of the reengineering. Leave on liver cholesterol transfer, VLDL-ch after digestion can be turned into a LDL-ch. Therefore, the change of serum VLDL-ch and LDL-ch appeared in two aspects, the blood cholesterol to mobile. clean up, prevent such as arteriosclerosis, cardiovascular system diseases and the disease of cerebral hemorrhage.

#### B. Effect of sports dance on blood circulation

Along with the growth of the age, their blood becomes dense, aggregation and concentrated, clinically known

as plasma high density, high cholesterol (VHS). This may lead to such as hypertension, coronary heart arteriosclerosis and thrombosis disease, coronary and other diseases. From a medical point of view, the blood density may, to some extent, reflects the quality of blood transmission, because of age, cardiovascular function become weak, therefore, blood concentration the decreased for the people who might have good reconstruction function. This situation can also slow the decay trend growth of tissue cells with age. The blood concentration of experimental participate group personnel to in the regular sports dance was significantly lower than the control that often participate group staff, this proves in blood concentration in sports dance can make its normal state. At the same time, the blood concentration and red cell aggregation is closely related to the higher concentration, blood, red blood cell aggregation will be more strong, red blood cell aggregation effects of amount of circulating blood volume, when the accumulation of blood volume was 0.47-0.53, the blood flow amount will be 46.0ml/100g, when the accumulation of blood volume was 0.36-0.46, the blood flow amount will be 65.0ml/100g. This shows that the accumulation of blood, the lower the amount of blood flow, the higher the. This proves that, long-term and sports dance training can improve the blood regular circulation, and provide enough blood to the head.

Low accumulation of red blood cells, normal to maintain good surface charge on red blood cell, in order to avoid agglomeration of blood is very good. In the aspect of red cell aggregation, the experimental group and the control group was significantly different (see Table 2), suggesting that the regular sports dance helps to improve and maintain the normal red cell surface density, the improvement is conducive to reducing the blood concentration, such as hypertension, coronary heart disease, arteriosclerosis and thrombosis and other diseases are effectively prevention.

#### C. The sports dance physical and psychological causes.

Psychology is the action of the human brain, mental development, must to normal health, especially health in the nervous system and the healthy development of the material foundation for the normal. Physical exercise body's normal, healthy can promote the development; provide a solid material foundation for the development of psychological. This is an important condition of psychological development. Sports dance plays an active role in strengthening college students 'health, here to provide some features of sports dance, display their physiological and psychological reasons for the following three aspects:

Dance in practice of elegant feeling. Sports dance music is full of lively rhythm and beautiful scene, students followed these music allows them to get a good state in the sense of elegance; these can improve the beating of the heart function.

In the dance move in which the dancer to straighten the chest, straight waist, tight hip, knee and relax down, these can shoulder to strengthen the chest, waist, hip, leg shoulder strength, and prevent bending the body, which makes the human nervous system, respiratory system, circulatory digestive system and system to normal operation.

Get rid of loneliness and casting temperament. College students with the increase of age and social work role change, they experience the loss of a series, must adjust the role, in order to adapt to the new environment. Often participate in sports dance so they gathered together to inspire people to make new friends. Especially those busy heavy learning of college students, the lost and alone may lead to certain diseases. Through sports dance practice, this college student's life rich, their troubles also eliminates. memory and judgment are improved, so the students have full mental state, full of hope for the future of life.

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