

EXPERIMENTAL STUDY ON THE MOTIVATIONAL ASPECTS OF BASKETBALL GAME AT YOUNG PLAYERS

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Abstract: *The present study starts from the premise that intervening on the psychological component, namely the motivational one, in training children and young players increases the chances of developing the somatic and motor abilities and skills, which will positively influence the individual performance and increase team efficiency. Final testing revealed that from the beginning of the experiment, and with periodic repetition of exercises, the results (in terms of time, number of throws, and number of repetitions) were all better, registering evident progress to most players.*

Key words: *basketball, motivational aspect, young players, experimental intervention.*

1. Introduction

Understanding and enhancing motivation is one of the most popular areas of research in sport psychology. However, many coaches and athletes are not aware of the research on specific strategies and techniques to enhance motivation [2].

Motivational processes can be defined by the psychological constructs that energize, direct, and regulate achievement behavior [6], [9].

Motivation is present in every action we make, even if we are aware of or not, but the process is reversed: the action merges with motivation for the activity from which is part. Although motivation appears only in the activity, it is reflected in the related actions since motifs are satisfied only in the actions or through action results. One of the main directions of research in this

area is to understand how and in what measure do athletes achieve high performances. The activation function of motivation [4], [7] is relevant to this perspective.

There is an optimal level of involvement and activation in each behavior or action. If an athlete's involvement is higher than the optimal one, the result is not necessarily an improvement of the sport performance. It can also lead to under-achievement.

Performance levels are correlated with the levels of activation – hypo, normal, and hyper-activation (Figure 1).

Social and situational factors also play an important role in achieving performance [5]. In collective sports, social factors may influence both the performance of game partners and that of competitors.

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The effects on playing behavior sometimes reside in lower quality of actions that are not automatized yet, or in wrong execution of the specific skills of

the athletes without a high level of neuromuscular control [8].

Negative effects on psycho-physiological skills are a result of hyper-activation.

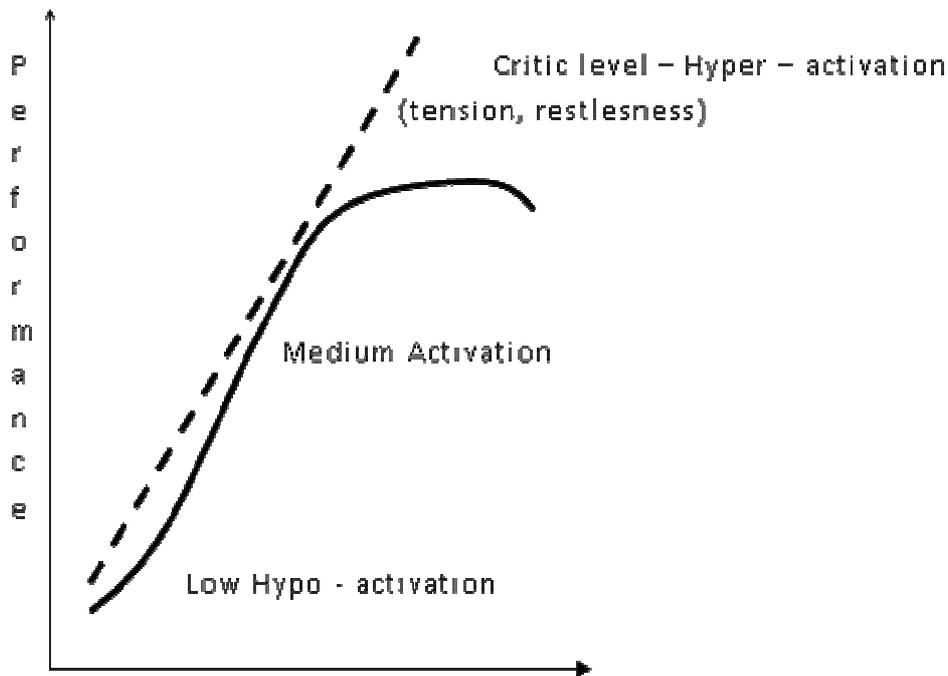


Fig. 1. *Performance curve – Activation – performance relation*

Several authors suggest that the competitions period should be divided in four phases according to motivational, activating, and involvement components: [5]:

Phase 1. This is the period in which the athlete is informed about participating to the competition. The individual sets himself, psychologically, for the competition to follow. Low states of tension, irritability, and a diffuse state of activation characterize this phase.

Phase 2. This is the period between the last training before the competition and the start of the competition. Now, the training involves technical and tactical preparation and aims mobilizing the athletes for what they are going to achieve.

Phase 3. This is the period defined by the state of the competition itself, starting with

the entry of the athlete in the atmosphere of the competition. The reactivity of the athlete varies from apparent apathy to high motivation, hyper-activation. Emotions may be very high and even disorganizing.

Phase 4. This phase is defined by the competition itself. Now the activation reaches the maximum level (it is desirable to be the optimal level).

Optimizing the level of activity is an extremely nuanced task, claiming great finesse in action dependent to the phase where the athlete is. Interventions designed to motivate the athlete pursue to bring his/her activation level to an average or optimum, with beneficial effects on muscle tension and the psychological tone.

It is the job of coaches and athletes to apply these principles in their specific

situations. Many coaches say that motivating athletes is their primary responsibility after teaching them the basic skills of the sport [1].

2. Purpose

The purpose of this study is to improve the psychological component of training youth basketball players, which will lead to an improvement of the individual and team performance.

3. Working Hypothesis and Method

The present study starts from the premise that intervening on the psychological component, namely the motivational one, in training children and young players increases the chances of developing the somatic and motor abilities and skills, which will positively influence the individual performance and increase team efficiency.

The independent variable consists in the system of methods and means that we have implemented as experimental intervention. The experimental intervention was conducted during participants' trainings by their coach. The methods included: exercises for the development of motor skills, for learning and consolidation of technical elements and of individual tactical actions, and motion games.

Twenty-five different exercises were used during trainings to improve the psychological component: consecutive shoots from different court position and out of restriction zone; two men passes full court scoring two consecutive basket; score 10 consecutive basket from the free throw line; three man passes; attack one

against two; lay-ups; hook shot with left hand and right hand; jump shot from a distance between 4 - 6,25m with 90 degrees shooting angle; quick throws; two man passes full court scoring two times; repeated side jumps; dribble suicido (84 m); slide in defense; pass to the wall; dribble between cones.

The dependent variable is the results obtained after applying independent variable: the individual performance. We used four different exercises to measure the participants' performance: score 10 consecutive basket from the free throw line; lay-ups; dribble suicido; quick throws.

For each exercise we used a five step rating scale: excellent, very good, good, poor, very poor, according to the performance.

Procedure: The participants were 14 young male basketball players, Under 16. The participants' performance at the four exercises mentioned before was assessed prior to the intervention (Initial Testing).

The training process consisted in 4 workouts /week during a competition year. At the end of the year, the dependable variable was measured again, using the four exercises.

4. Results

Final testing revealed that from the beginning of the experiment, and with periodic repetition of exercises, the results (in terms of time, number of throws, and number of repetitions) were all better, registering evident progress to most players.

Performance obtained at initial and final testing – 10 Free throws Table 1

Player	Initial testing Free throws 10 shoots	Rating	Final testing Free throws 10 shoots	Rating
M.A	5	poor	6	good
O.A	9	very good	10	excellent
S.R	6	good	7	good
C.D	5	poor	5	poor
D.C	4	very poor	7	good
D.D	3	very poor	5	poor
U.R	4	very poor	5	poor
I.A	5	poor	6	good
P.M	5	poor	7	good
C.O	6	good	8	very good
L.A	3	very poor	3	very poor
B.O	3	poor	5	poor
I.A	8	very good	9	very good
C.C	6	good	5	poor
Arithmetical average	5,14		6,29	
Standard deviation	1,791		1,858	
Coefficient of variation				2,602

Frequency Sample 1 – Free throws

Table 2

Rating initial testing	Absolute frequencies	Relative frequencies	Rating final testing	Absolute frequency	Relative frequency
excellent	0	0/14	excellent	1	1/14
very good	2	2/14	very good	2	2/14
good	3	3/14	good	5	5/14
poor	5	5/14	poor	5	5/14
very poor	4	4/14	very poor	1	1/14

As regards the first test, **free throws**, at initial testing an average of 5.14% with a standard deviation of 1,791% and with a coefficient of 2.602% has been obtained which demonstrates a high degree of homogeneity.

After completing the proposed test systems for about six months, the final testing team achieved an average of 6.29% free throws, with standard deviation of 1.858, which shows that the degree of dispersion around the mean value is very small.

Improvement of initial and final test is 1.15 (index that we consider very good). So to the final testing we have achieved

one grade of excellent, up from 0 to initial testing.

As regards the second test, **lay-ups**, at initial testing an average of 1.83% with a standard deviation of 1.169% and a coefficient of -0.083% has been obtained, which demonstrates a high degree of homogeneity.

After completing my proposed test systems for about six months, at the final testing team achieved an average of 1.50% lay-ups, with standard deviation of 0.548%, which proves that the degree of dispersion around the average value is very small.

Improvement of initial and final testing (doing a decrease between initial and final testing), is consider to be very good. So to the final testing a slight improvement was noted.

Statistical results for Sample 2 – Lay-ups

Table 3

	Initial testing	Final testing
Arithmetical average	1,83	1,50
Standard deviation	1,169	0,548
Coefficient of variation	-0,083	

Frequency Sample 2 - Lay-ups

Table 4

Rating initial testing	Absolute frequencies	Relative frequencies	Rating final testing	Absolute frequency	Relative frequency
very good	1	1/14	very good	3	3/14
good	2	2/14	good	3	3/14
poor	2	2/14	poor	0	0/14
very poor	1	1/14	very poor	0	0/14

As regards the third test, dribble suicido initial testing has been obtained an average of 22.86% with a standard deviation of 1.318% and a coefficient of 1.538%, which demonstrates a high degree of homogeneity.

After completing my proposed test systems for about six months, at final testing team achieved an average of 22.89% to the dribble suicido test, with standard deviation of 1.267%, which proves that the degree of dispersion around the average value is very small.

Performance obtained at initial and the final testing - Dribble suicido

Table 5

Player	Initial testing Dribble suicido	Rating	Final testing Dribble suicido	Rating
M.A	22,30	very good	22,10	very good
O.A	26,02	very poor	25,80	very poor
S.R	22,20	very good	22,10	very good
C.D	24,17	good	24,01	good
D.C	21,78	very good	21,60	very good
D.D	23,30	good	23,25	very good
U.R	23,12	good	23,10	good
I.A	21,20	very good	21,25	very good
P.M	23,60	good	23,45	good
C.O	22,50	good	23,00	good
L.A	23,82	good	24,00	good
B.O	21,20	very good	21,15	very good
I.A	22,25	very good	22,20	very good
C.C	23,50	good	23,44	good
Arithmetical average		22,86	22,89	
Standard deviation		1,318	1,267	
Coefficient of variation		1,538		

Frequency Sample 3 Dribble suicido

Table 6

Rating initial testing	Absolute frequencies	Relative frequencies	Rating final testing	Absolute frequency	Relative frequency
excellent	0	0/14	excellent	0	0/14
very good	6	6/14	very good	7	7/14
good	7	7/14	good	6	6/14
poor	0	0/14	poor	0	0/14
very poor	1	1/14	very poor	1	1/14

Improvement of initial and final testing is 0.03% index that we consider very well. So the final testing was able to notice a slight improvement.

As regards the fourth sample, **quick throws**, at initial testing has been obtained an average of 5.43% with a standard deviation of 1.785% and a coefficient of 3.235%, which demonstrates a high degree

of homogeneity.

After completing my proposed test systems for about six months, the final testing team has achieved an average of 5.79% quick throws, with standard deviation of 2.225%, which proves that the degree of dispersion around the mean value is very small.

Performance obtained at initial and the final testing – Quick throws

Table 7

Player	Initial testing Quick throws	Rating	Initial testing Quick throws	Rating
M.A	6	excellent	7	good
O.A	10	very good	11	excellent
S.R	6	poor	7	good
C.D	6	poor	6	poor
D.C	5	poor	6	poor
D.D	4	very poor	3	very poor
U.R	3	very poor	5	poor
I.A	4	poor	5	poor
P.M	5	poor	3	very poor
C.O	5	poor	4	very poor
L.A	6	poor	7	very poor
B.O	6	poor	6	poor
I.A	7	good	8	good
C.C	3	very poor	3	very poor
Arithmetical average		5,43	5,79	
Standard deviation		1,785	2,225	
Coefficient of variation		3,235		

Improvement of the initial and final testing is 36, index that we consider very well.

So the final testing we got 1 rating of excellent, from 0 to initial testing.

5. Conclusions and methodical recommendations

The paper emphasizes the importance of psychological factor in obtaining performance in the men basketball team, and the coach's role in determining and influencing this psychological factor.

The art of managing the psychological factor in the process of the athlete's personality involves endless exercises of initiation, self control, control and improvement through educational actions, rationally planned and closely coordinated with the entire process of personality development of the athlete.

Some methodological recommendations that we can make in this direction are:

- ❖ Coach is the person who made direct contact with the athlete, influence the process of preparing to get the best results, print a positive-thinking action in the preparation in order to achieve the maximum potential of each of them. It is recommended that coaches treat with greater importance the psychological preparation, in the training process, as well as outside (ex: free time, trips).
- ❖ Reducing the insistence with which some organizers require more competitive situations, more victories at any cost, even for young ages, losing sight of the competition effects in formative plan of athletes' personality.
- ❖ The need for extensive and intensive research on the sphere of psychological factor, coach and

sports organization officials. Shaping a simple theories, consistent and clear, reflecting the actual content of the proposed objectives.

- ❖ The need for coaches to participate at periodic training for gathering information on the new training methods applied in countries where basketball performances are superior to our country.
- ❖ The need for coaches to be up with the athlete life events, in order to be able to counteract the negative factors that influence player development.

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