

Profil Level of Physical Conditions for Basketball

Priyanto Priyanto, Haris Kurnianto, Herdian Agung Prakoso, Arief Setyo Pranoto

Universitas Negeri Semarang, Indonesia

*Corresponding Author: priyanto@mail.unnes.ac.id

Received: 2023-02-15. Accepted: 2023-04-10. Published: 2023-06-13.

Abstract. The purpose of this study was to determine the level of physical condition of the Academy Jaguar Basketball athletes in Semarang City in 2022. The population of this study was all athletes in the Academy Jaguar Basketball Semarang City in 2022, totaling 12 athletes. The sample used in this study used total sampling. The results showed that the average score of the athlete's physical condition level was 2.65 which was included in the less category. Judging from the level of physical condition of each athlete, it is known that there are 9 students (75%), then a number of 3 athletes (25%) in the category are moderate. This study concluded that the physical condition of the basketball athletes at the Jaguar Basketball Academy was in the poor category.

Key words: Physical Condition, Athletes, Basketball.

Abstract in Indonesia. Penelitian ini memiliki tujuan yaitu mengetahui tingkat kondisi fisik atlet Academy Jaguar Basketball Kota Semarang Tahun 2022. Penelitian ini memilih populasi yaitu keseluruhan atlet Academy Jaguar Basketball Kota Semarang Tahun 2022 yang berjumlah 12 atlet Sampel yang digunakan dalam penelitian ini menggunakan total sampling. Hasil penelitian menunjukkan kategori kondisi fisik atlet disimpulkan kurang dengan nilai rerata 2,65. Terdapat sebanyak 9 atlet (75%) yang masuk kondisi kurang sedangkan sisanya 3 atlet kondisinya sedang (25%). Penelitian ini memperoleh kesimpulan bahwa kondisi fisik atlet para atlet bola basket di Academy Jaguar Basketball berkategori kurang.

Kata Kunci: Kondisi Fisik, Atlet, Bola Basket.

How to Cite: Priyanto, P., Kurnianto, H., Prakoso, H.A., Pranoto, A. S. (2023). Profil Level of Physical Conditions for Basketball. *MIKI: Media Ilmu Keolahragaan Indonesia* 13 (1), 23-27.

DOI: <http://dx.doi.org/10.15294/miki.v13i1.44705>

INTRODUCTION

Understanding of the physical condition, namely the ability of a person can be known to what extent his ability as a supporter of running sports activities. Physical condition can also be interpreted as a player's body condition. Physical condition is one unified whole of the components that cannot be simply separated, both in terms of improvement and maintenance. This means that in an effort to improve physical conditions, all of these components must be developed, although here and there a priority system is carried out according to the circumstances or status of each of these components and for what needs the condition or status is needed (M. Sajoto, 1988: 53).

According to Harsono (1988), if the physical condition is good then: (1) there will be an increase in the ability of the circulatory system and heart work. (2) there will be an increase in strength, flexibility, stamina, speed and other components of physical condition. (3) there will be better economy of motion during exercise. (4) there will be faster recovery in the organs of the body after exercise. (5) there will be a rapid response from the body's organism if at any time such a response is needed.

According to M. Sajoto (1988) there are 10 types of physical conditions, namely: 1) Strength, 2) Endurance, 3) Muscular power, 4) Speed, 5) Flexibility (flexibility), 6) agility, 7) coordination, 8) balance, 9) accuracy, 10) reaction. While the physical conditions needed in volleyball are: 1) Strength, 2) Endurance, 3) Muscular power, 4) Speed, 5) Flexibility, 6) agility (agility). The problem of this research is what is the condition profile of athletes. The goal to be achieved in this study is to find out the condition profile of Academy Jaguar Basketball athletes in 2022.

METHODS

This study determines the population includes Academy Jaguar Basketball athletes in 2022 with a total of 12 people. The selection of the sample used the total sampling technique, which means that all 12 Academy Jaguar Basketball athletes were used as the research sample. The variables in this study are profiles of physical conditions which include strength, endurance, muscular power, speed, flexibility and agility as measured by tests and measurements. data collection in this study used a survey method with test techniques, then the research instrument was the Arm and Shoulder Muscle Strength Test in Pushing, Arm and Shoulder Muscle Strength Test in Pulling, Back Muscle Strength Test, Leg Muscle Strength Test, Abdominal Muscle Endurance Test , Arm and Shoulder Muscle Endurance Test, Agility Test, Speed Test, Flexibility Test, Limb Muscle Explosive Test, Cardiac Work Endurance Test / VO2Max. The data analysis technique used to test the data in this study is a descriptive analysis of percentages. Where the results of the research data are calculated as a percentage of how many athletes are in the very good, good, medium, poor and very poor categories.

RESULTS AND DISCUSSION

Based on the results of this study it is known that the physical condition of Academy Jaguar Basketball athletes in 2022 is in the less category, as presented in the table below

Table 1. Research Results

N	Minimum	Maximum	Mean	Std. Deviation
20	2.52	2.98	2.65	0.17
Score Range	Category	Frequency	Percentage (%)	
4.8 -5.0	That's very nice	0	0,0	
3.8 - 4.7	Good	0	0,0	
2.8 - 4.7	Keep	3	25,0	
1.8 - 2.7	Less	9	75,0	
1.0 - 1.7	Very less	0	0,0	
Sum		12	100	

Based on the table above, it shows that the average level of physical condition of Academy Jaguar Basketball athletes in 2020 as a whole is still mostly in the less category. With the level of physical condition in the less category, of course it will affect the quality of the basic technical training of the game as well as the quality of the games performed by Academy Jaguar Basketball athletes in 2022. This is because in various sports including basketball, physical condition factors have an important role in supporting the achievements of an athlete or player.

Based on the results of the study it was found that the strength of the arm and shoulder muscles of Academy Jaguar Basketball 2020 athletes in pushing was included in the moderate category, namely 8 athletes (66.7%), the remaining 4 athletes (33.3%) were in the less category. The strength of the arm and shoulder muscles of the 2022 Academy Jaguar Basketball athletes in pulling is balanced between the moderate and very less categories, namely 4 athletes (33.3%) in the moderate category and 4 athletes (33.3%) in the very less category, the remaining 2 athletes (16.7%) in the very good category and 2 athletes (16.7%) in the good category. The back muscle strength of Academy Jaguar Basketball 2020 athletes was included in the very good category, namely 6 athletes (50%), the remaining 5 athletes (41.7%) were in the good category and 1 athlete (8.3%) was in the moderate category. The leg muscle strength of Academy Jaguar Basketball 2020 athletes was included in the poor category, namely 8 athletes (66.7%), the remaining 4 athletes (33.3%) were in the moderate category. The hand muscle strength of Academy Jaguar Basketball athletes in 2022 is included in the moderate category, namely 10 athletes (83.3%), the remaining 2 athletes (16.7%) are in the good category. The hand muscle strength of Academy Jaguar Basketball athletes in 2022 is included in the moderate category, namely 10 athletes (83.3%), the remaining 1 athlete (8.3%) is in the very good category, and 1 athlete (8.3%) is in the good category .

Based on the results of the study it was found that the abdominal muscle endurance of Academy Jaguar Basketball 2020 athletes was included in the moderate category, namely 11 athletes (91.7%) and 1 athlete (8.3%) were in the good category. The cardiodespiratory endurance of Academy Jaguar Basketball 2020 athletes was included in the very poor category, namely 12 athletes (100%), overall in the very poor category. Anaerobic endurance of Academy Jaguar Basketball 2020 athletes was included in the less category, namely 6 athletes (50%) in the less category, 4 athletes (33.3%) in the medium category, and 2 athletes (16.7%) in the very less category .

Based on the research results, it is known that the agility level of Academy Jaguar Basketball athletes in 2022 is included in the very good category, namely 12 athletes (100%), overall in the very good category. The speed level of Academy Jaguar Basketball athletes in 2022 is included in the very less category, namely 12 athletes (100%), overall in the very less category. The level of flexibility of the Academy Jaguar Basketball athletes in 2022 is included in the moderate category, namely 11 athletes (91.7%) and 1 athlete (8.3%) are in the good category. The leg muscle power (Power) of Academy Jaguar Basketball athletes in 2022 is balanced between the less and very less categories, namely 6 athletes (50%) in the moderate category and 6 athletes (50%) in the very less category. The 2022 Academy Jaguar Basketball athlete's shoulder muscle explosive power is in the medium category, namely 7 athletes (58.3%) and 5 athletes (41.7%) in the less category.

After it is known that physical condition is a prerequisite that must be possessed by an athlete in improving and developing optimal sports performance, so that all physical conditions must be developed and improved according to the characteristics, characteristics and needs of each sport and looking at the results of tests on the level of physical condition Academy Jaguar Basketball athletes in 2022 are still in the lacking category, so efforts are needed to improve the quality of physical conditions by carrying out training systematically with reference to training programs and training principles which include: 1) Training must be carried out throughout the year without alternating considering the nature of athlete (human) adaptation to loads the training received is labile. So it is necessary to have a training load that is continuous on a regular, directed and continuous basis, 2) a regular increase in the load, the longer the training increases the weight, but the increase in the training load must be little by little. Do not increase the load every time you practice, preferably two or three new weight training times, 3) individual principles (individuals), every athlete as a human being consisting of body and soul must be different in terms of physical mental, character and level of ability. individual principles are a real difference between training and teaching for the sake of achievement maximum exercise, 4) interval principle, this principle is very important in training plans of a daily, weekly, monthly, yearly nature which are useful for the physical and mental recovery of athletes in carrying out exercises.

Internal problems can be carried out with full rest without carrying out exercises, as well as active rest, the benefits of intervals are to avoid over training, giving the athlete's organs the opportunity to adapt to the previous training load, energy recovery for athletes in the training process, 5) the principle of stress (emphasis), Training must result in the physical and mental stress of the athlete. The training load carried out by athletes should really feel heavy, then fatigue arises. Physical and mental stress is very important to improve performance, but continuous stress without showing the athlete's condition will adversely affect the athlete's ability and will cause negative things. For example: decreased performance, injury, fear of training, etc.

CONCLUSION

Based on the results of the research and discussion, it can be concluded that the physical condition of Academy Jaguar Basketball athletes in 2022 is in the poor category. Of the 14 components of physical condition assessed, only two were in the very good category, namely, the components of back muscle strength and agility, while for the components of shoulder arm power, flexibility of the torso, muscle strength of both left and right hands, arm and shoulder muscle strength for pushing and Attractiveness is included in the moderate category, then for the components of Cardiodespiratory endurance, leg muscle explosiveness, leg muscle strength and abdominal muscle strength are included in the poor category. The rest are included in the very less category, namely for the speed and Anaerobic endurance components.

ACKNOWLEDGEMENT

In writing this article the researcher received assistance from various parties, therefore with humility and sincerity, allow the author to express his deepest gratitude to Jaguar Basketball Team and PERBASASI of Semarang City.

REFERENCES

- A. Eva Ayu. (2022). Analisis Kondisi Fisik Atlet Softball Putri Kota Kudus Menuju PORPROV XVI. *Jurnal Olahraga Prestasi*, 18(2)
- Agustin, D., & Sulistyarto, S. (2017). Analisis Kondisi Fisik Atlet Floorball Universitas Negeri Surabaya. *Jurnal Kesehatan Olahraga*, 5(2), 29–36
- Arikunto, S. (2006). *Prosedur Penelitian*. Rineka Cipta.
- Effendi, N. A. (2020). Kooperatif Tipe Teams Games Tournament (TGT) Dalam Pembelajaran Softball. *Jurnal Pendidikan*, 6–44.
- Fathoni, A., & Rachman, H. A. (2020). Effect of Sprint Training Exercise, Shuttle Run and Prevention on Base Softball Running Speed Among High School Students. *Acta Facultatis Educationis Physicae Universitatis Comenianae*, 60(1), 32–43.
- Hakim, A. R., Soegiyanto, & Soekardi. (2013). Pengaruh Usia Dan Latihan Keseimbangan Terhadap Kemampuan Motorik Kasar Anak Tunagrahita Kelas Bawah Mampu Didik Sekolah Luar Biasa. *Journal of Physical Education and Sports*, 2(1), 201–204.
- Harsono. 1988. *Coaching dan aspek psikologi dalam coaching*. Dirjen Dikti: Jakarta.
- Herdina, A., Rahfiludin, Z., & Kartini, A. (2016). Hubungan Kadar Hemoglobin, Presentase Lemak Tubuh, Aktivitas Fisik Dan Status Merokok Dengan Daya Tahan Aerobik Atlet Softball. *Jurnal Kesehatan Masyarakat*, 7, 1–23
- M. Sajoto. 1988. *Pembinaan Kondisi Fisik Dalam Olahraga*. Jakarta: Departemen Pendidikan dan Kebudayaan.
- Sutrisno Hadi. 2004. *Statistik Jilid 2*. Yogyakarta: Andi Offset
- Irawan, F. A., & Prasetyo, F. E. (2019). Sport Infrastructure for Physical Education in Senior High School. *International Journal of Multicultural and Multireligious Understanding*, 6(1), 66–70.
- Jatmiko Septa, Riski. (2022). Perbedaan Kemampuan Daya Tahan Aerobik Dan Daya Tahan Anaerobik Pemain Belakang, Pemain Tengah, Dan Pemain Depan Sepakbola PS Subur Jaya Blora.
- Maliki, O., Hadi, H., & Royana, I. F. (2017). Analisis Kondisi Fisik Pemain Sepak Bola Klub PERSEPU UPGRIIS Tahun 2016. 1 - 8
- Nurhasan. (2001). *Tes Dan Pengukuran Olahraga Dalam Pendidikan Jasmani*. Jakarta Pusat. Direktorat Jendral Olahraga, Depdiknas
- Palar, C. M., Wongkar, D., & Ticoalu, S. H. R. (2015). Manfaat Latihan Olahraga Aerobik Terhadap Kebugaran Fisik Manusia. *Jurnal E-Biomedik*, 3(1). <https://doi.org/10.35790/ebm.3.1.2015.7127>
- Pane, B. S. (2015). Peranan Olahraga Dalam Meningkatkan Kesehatan. 21, 1–4.
- Parena, A. A., Rahayu, T., & Sugiharto. (2017). Manajemen Program Pembinaan Olahraga Panahan pada Pusat Pendidikan dan Latihan Pelajar (PPLP) Provinsi Jawa Tengah. *Journal of Physical Education and Sports*, 6(1), 1–6.
- Putra, E. A. (2015). Anak Berkesulitan Belajar di Sekolah Dasar Se-Kelurahan Kalumbuk Padang. *Jurnal Ilmiah Pendidikan Khusus*, 1(3), 71–76. <http://103.216.87.80/index.php/jupekhu/article/viewFile/6065/4707>
- Ridwan, M. (2020). Kondisi Fisik Pemain Sekolah Sepakbola (SSB) Kota Padang. *Jurnal Performa Olahraga*, 5(1), 65–72. <https://doi.org/10.24036/jpo142019>
- Rihatno, T., & Tobing, S. R. A. L. (2019). Pengembangan Model Latihan Kekuatan Otot Lengan Pada Cabang Olahraga Softball. *Gladi: Jurnal Ilmu Keolahragaan*, 10(1), 1–14. <https://doi.org/10.21009/gjik.101.01>
- Rimake Yulia Putri, Slamet, M. Kes, A. J. (2018). Hubungan Kekuatan Otot Lengan dan Bahu Dengan Ketepatan Lembaga atas Softball Pada Mahasiswa Semester V Kepelatihan Olahraga Universitas Riau. 081365361995, 1–8.
- Sepdanius, E., Rifki, S. M., & Komaini, A. (2019). Tes Dan Pengukuran. In *Rajawali Pers*.
- Subarjah, H. (2013). Latihan Kondisi Fisik. *Educacion*, 53(9), 266–276.

- Sugiyono (2017). Metode Penelitian Kuantitatifn Kualitatif, dan R&D. Bandung. Alfabeta, CV.
- Suhartini, B. (2011). Mengenal Olahraga Softball.
- Taruna, D. (2022). Tingkat Kondisi Fisik Atlet Sepak Takraw Pusat Pembinaan Dan Latihan Pelajar (PPLP) DISPORA RIAU (Issue January). Universitas Islam Riau Pekanbaru.
- Zulhendri. (2022). Studi Kelayakan Sarana dan Prasarana Wilayah Kabupaten Kuantan Singingi Dalam Menghadapi Pekan Olahraga Provinsi (PORPROV) Riau X Tahun 2022 (Studi Kasus Sport Center Teluk Kuantan). Jurnal Perencanaan, Sains, Teknologi, Dan Komputer, 4(1), 729–744.