



Science, Movement and Health, Vol. XXIV, ISSUE 2 Supplement, 2024
September 2024, 24 (2): 332-342
Original article

THE EFFECTS OF THE COVID-19 PANDEMIC ON THE PARTICIPATION IN NATIONAL JUNIOR HANDBALL COMPETITIONS

VĂRZARU CRISTINA¹, TUDOR VIRGIL¹, MUJEA ANA-MARIA¹

Abstract

Aim. The aim of this paper is to closely analyse the fluctuation of the number of participating teams for each age category at juniors' level in all 3 competition seasons held under the sign of the restrictions imposed in connection with the coronavirus pandemic.

The coronavirus pandemic severely affected the sports' world, leading to the postponement of major sport events, including the Olympic Games, but also the cancellation of most competitions around the world, regardless of the sport.

Methods. To analyze the impact on handball for juniors in Romania, the number of participating teams and withdrawals teams, as well as the form of competitions' organization during 3 competition seasons was compared (2019-2020, 2020-2021, 2021-2022), both in the male and female sectors for Juniors 1 – Under 19, Juniors 2 – Under 17, Juniors 3 – Under 15.

Results. The return to a handball life closer to normal was achieved with the start of the 2021-2022 competition season. The new COVID conditions imposed for participation at the beginning of 2021-2022 season encouraged the teams to re-register and there was a clear increase in the participation in each Juniors' category. In this season, a total number of 309 teams participated in the competitions held for juniors in Romania: 84 participants in Juniors 1 (Under 19) competitions, 91 participants in Juniors 2 (Under 17) competitions and 134 participants in Juniors 3 (Under 15) competitions.

Conclusions. The number means an increase of 109 teams in the current season, comparing with 2020-2021 season, but still a reduced number of teams compared with 2019-2020, a season that started without any restrictions.

Keywords: handball, pandemic, juniors, competitions.

Introduction

According to Weed (2020), the first cluster of COVID-19 cases was recorded in Wuhan, China on 21st December 2019, and the first death on 11th January 2020. At that time, no one suspected the amplitude of the spread of the virus and the situation was seen rather as an individual problem specific to the Asian people. Unfortunately, the reality was completely different. Cases of SARS CoV-2 were thereafter exported across China, as well as internationally (Timpka, 2020). Everyone would soon realize that the danger of this virus is extremely high due to its rapid spread and because the developed forms differ from one person to another, the most serious form leading to severe treatments and death. In the second half of 2020, the SARS-COV-2 virus has already infected over 4.5 million worldwide with more than 300.00 deaths (World Health Organization, 2020). Local communities responsible for health protection around the world have realized the crisis facing humanity and have begun to develop and implement measures to combat the spread of this new virus and its devastating effects. The measures taken in almost all around were unimaginable, with our world coming to a complete stop in a sudden and unprecedented way (Gilat & Cole, 2020).

The COVID-19 pandemic has had and will have profound effects on every person on earth. (Carmody et al., 2020). We have found ourselves in the position of adapting to a new reality in which the social distancing or wearing a face mask would have been a part of the daily routine for a very long time. The coronavirus crisis has not just had a profound impact on our lifestyles, socializing patterns (Kucheryavenko & Beletskaya, 2020), but on our all-daily professional activities, regardless of the field of activity. Office work soon turned into work from home, all kinds of meetings have moved into the online environment.

Sport has often had an important role in times of crisis, but the COVID-19 pandemic was another matter (Svensson & Radmann, 2020). This time, the medical experts had to accept that the practice of physical exercises and sports would not help to prevent the onset of the disease, nor the easier passage through it and had to add the physical exercises and sports along with all other activities that suffered restrictions in the COVID-19 era.

The new and unexpected events caused by the spread of coronavirus has imposed new challenges on those involved in sport, by them amateurs and professionals (Boschilia et al., 2020). The dramatic changes to the world of sports (Hakansson et al., 2020), the difficulty of generating sports contents as usual (Xiaobo & Wagner, 2022), put sports leaders in a new, extremely difficult situation which they had never encountered before. Within the sports community, all forms of organized sport have been either cancelled or postponed. (Yeo, 2020). They were resumed many months later and gradually, far from being considered normal, with harsh hygiene rules designed to combat the spread of

¹ National University of Physical Education and Sports, Bucharest, Romania; Corresponding author: cristina.varzaru@csmbucuresti.ro.

coronavirus that generated much higher costs than usual for the local government budgets, in their efforts to fund their share of sport-related infrastructure expenditures (Mayer & Coco, 2021).

Romania was also caught in the context of the evolution of epidemiological situation determined by the rapid proliferation of the disease (Musa et. al., 2020). The first case of COVID-19 was announced on 26th February 2020 and less than 1 month later (on 16th of March) the State of Emergency was decreed on the Romanian territory at first for 1 month, only to be extended later until 14th of May, when the president of Romania announced the transition from the state of emergency into the state of alert. The state of alert ended almost two years later, on March 9, 2022.

During the state of emergency, no sport competitions in Romania was allowed, all being postponed or cancelled. The resumption of indoor sports competitions took place in September 2020. The national sports federations had conducted their activities in accordance with the Ministry of Youth and Sports/Ministry of Health Common Order, a document whose role was to establish the conditions under which sports activities would organize, to prevent the spread of SARS CoV-2.

The Romanian Handball Federation, the only authority responsible with the organization and control of all handball activities from Romania can be proud of the fact that it was the first indoor sports federation which acted to reopen the indoor competitions in Romania, by submitting to the Ministry of Sports a detailed project for the resumption of indoor competitions. The action did not remain without effect within the authorities. The first handball competition organized after the long break, being in fact also the first indoor competition in Romania, was the Women's Romanian Cup – seniors, held between 3 and 6 September 2020.

Unfortunately, children's and juniors' indoor competitions have been delayed for many months, due to the restrictions and measures taken by the Ministry of Sport in close collaboration with the Ministry of Health. Furthermore, due to the conditions imposed to prevent the spread of the virus, both for daily training sessions and for competitions, many of the usual clubs participating at the level of children and juniors could not afford the costs imposed by the medical protocol published on the Romanian Handball Federation website, that established participation in tournaments instead of normal stages, RT-PCR testing for each tournament, and so on.

Objectives

Therefore, the number of participants in children's and juniors' competitions suffered enormously in the 2020-2021 competition season. The aim of this study is to analyze the impact and effects on the conditions imposed to prevent the spread of coronavirus, on the number of participants in the age categories for which the Romanian Handball Federation organizes competitions for male and female juniors (Juniors 1 – Under 19, Juniors 2 – Under 17, Juniors 3 – Under 15), drawing a parallel between the season that was underway at the time of the appearance of COVID-19 (2019-2020), the season in which the competitions were resumed in very special pandemic conditions (2020-2021) and the current season, in which conditions related to SARS CoV-2 have been significantly relaxed and finally dropped (2021-2022).

Methods

The research was carried out on the teams participating in all competitions for juniors conducted by the Romanian Handball Federation. The number of participating teams and withdrawals teams, as well as the form of competitions' organization during 3 competition seasons was compared, both in the male and female sectors for Juniors 1 – Under 19, Juniors 2 – Under 17, Juniors 3 – Under 15. The comparison was possible using the statistical-mathematical indicators such as sum, average, percentage, doubled by graphical methods as chart and pie, for a better and clear highlighting of differences observed in the results.

Results

At the time of the establishment of the state of emergency on the Romanian territory (16th of March 2020), the Romanian Handball Federation had to align itself with the measures imposed by the responsible authorities including the lockdown, along with the cessation of all sports competitions. Having as a main purpose to end on the field all the handball competitions for the ongoing season (2019-2020), the Romanian Handball Federation took its first decision to stop all its competitions in the period 13th of March – March 31, hoping that the situation regarding the COVID-19 pandemic will get better and the competitions can be resumed starting from 1st of April 2020. Unfortunately, what was thought to be a short and isolated situation turned into a far-reaching crisis that lasted much longer than expected.

The second decision of the Administration Council of the Romanian Handball Federation in the regard of the same problem came less than one month later, together with the extension of the state of emergency at national level and led to the cessation of all domestic handball competitions until the exit from the state of emergency. Even then, the two responsible structures within the R.H.F., the Competitions' Department and Commission had remained true to the strategy of finishing all handball competitions, including the Juniors' competitions preparing and planning organizational ways to shorten the part of 2019-2020 season which was not yet unfolded. In this regard, the decision approved by the Administration Council was to:

- Cancellation of all “Hope” final tournaments. The “Hope” part of the competitions is dedicated to the teams that fail to qualify in the first value group and was founded out of the desire to offer the possibility to all teams, regardless of their level of playing handball, to dispute as many matches as possible during a competition season.
- For Juniors 1, 2, 3 - male and Juniors 1 and 2 – female: Direct play of the “Value” final tournaments, with the participation of the best 8 teams of each category that were situated on the qualifying places at the time of the suspension of the competitions.
- For Juniors 3 – female: direct play of the “Value” final tournament, with the participation of the teams ranked 1st at the end of geographical groups.

The last decision of the Administration Council of the Romanian Handball Federation was unfortunately the hardest and most drastic, at the same time the only decision wanted to be avoided – the call of closing the 2019-2020 competition season for juniors without drawing up a final ranking and without awarding the champions and medals.

The attention of the Competitions' Department and Commission had moved instantly to elaborate different variants of organizing and conducting the next competition season for juniors (2020-2021), which should have normally started in the same period with the School Year, around 15th of September. The general hope was that national health authorities will launch the indoor competitions and the pandemic requirements until that date. That wasn't the case, either.

Juniors' indoor competitions have been delayed for many months since the resumption of the same competitions for seniors (September 2020). The entire competition season 2020-2021 took place under the auspices of preventing the spread of SARS CoV-2 virus, which generated a series of harsh conditions for participation of all age categories, including juniors. In addition to the competition regulations, the medical protocol for organizing and conducting of handball competitions was born and had to be respected by everybody during the state of alert. This document has been developed in accordance with the Ministry of Youth and Sports/Ministry of Health Common Order and has undergone multiple changes over nearly two years.

To limit the contact with the outside world, the “bubble” system with no spectators was mandatory, along with the obligation of RT-PCR testing with maximum 48 hours before each handball tournament, additional testing being required if the tournament lasted more than 14 days. The conditions were fully respected by the federation and its affiliated members, but raised many issues, due to high implementation costs regarding travelling, accommodation and meals, ambulance services, RT-PCR tests and so on, especially for regular clubs with junior teams.

Even if the Romanian Handball Federation has helped all the teams participating in handball competitions, bearing a serious part of the costs (ambulance and guard services, RT-PCR tests of referees and delegates, accommodation, and meals of officials), the drastic reduction of the number of teams participating in the 2020-2021 juniors' competitions could not be avoided.

The 2021-2022 competition season coincided with the relaxation of the conditions imposed to prevent the spread of coronavirus. The RT-PCR tests were replaced with antigen tests which are much cheaper and later in the season the tests were eliminated. The competition system has returned to its original structure, giving up the “bubble system” form.

Juniors 1 (Under 19)

At the time of the establishment of the state of emergency on the Romanian territory, the competition season of Juniors 1 – female was in full swing. The structure of the competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” and “Hope” Groups and Final Tournament (“Value” and “Hope”). The number of registered teams in the female sector was up to 35, divided during the geographical groups into 6 series. The number of withdrawn teams registered before the lockdown was 2, due to the financial problems arising from their non-qualification in the main “Value” groups.

During the next season (2020-2021) the structure of the competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” Groups and Final “Value” Tournament, carried out only in tournaments, as following:

- 15-17.01.2021 and 19-21.02.2021 – tournaments that scheduled the Home and Away Geographical Groups
- 26-28.03.2021 and 23-25.04.2021 – tournaments that scheduled the Home and Away “Value” Main Groups
- 05-09.05.2021 – Final “Value” Tournament

There were only 22 female teams registered in the 2020-2021 season, ready to bear all extra costs regarding COVID-19 conditions. The teams were divided as in the previous season, into 6 series. No team withdrew after the start of the season, but many teams faced problems with COVID-19 infection and were forced not to show up for different games. In this situation, the team in question lost the game with 10-0.

In the current season (2021-2022), 46 female teams registered into the competition that came back to the normal structure. Once again, the teams were divided into 6 series and the number of withdrawn team was counted to two, due to financial problems.

Table 1. Situation of Juniors 1 – female along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	35	22	46
Number of withdrawn teams	2	0	2
Number of series	6	6	6

As observed in the table above (Table 1), the lowest number of female teams registered in the juniors 1 competition was in 2020-2021, the season with the most and heaviest pandemic conditions. 13 teams couldn't handle the most expensive season ever and decided not to register and participate. When getting back to almost normal handball activities, with relaxed COVID-19 requirements, the number of registered team was even higher than before coronavirus. There were 11 more female teams than in 2019-2020 and 24 more female teams than in the previous season.

When talking about Juniors 1 – male sector, the 2019-2020 competition season has the same structure as the female sector: a system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” and “Hope” Groups and Final Tournament (“Value” and “Hope”). The number of registered male teams was up to 46, divided during the geographical groups into 6 series. There was only one withdrawn team registered before the lockdown, due to financial problems.

During the next season (2020-2021) the structure of the male Juniors 1 competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” Groups and Final “Value” Tournament, carried out only in tournaments, as following:

- 03-07.02.2021 and 03-07.03.2021 – tournaments that scheduled the Home and Away Geographical Groups
- 02-04.04.2021 and 07-09.05.2021 – tournaments that scheduled the Home and Away “Value” Main Groups
- 02-06.06.2021 – Final “Value” Tournament

There were only 28 male teams registered in the 2020-2021 season, ready to bear all extra costs regarding COVID-19 conditions. The teams were divided as in the previous season, into 6 series. Only one team withdrew after the start of the season, due to financial problems. Also, this competition faced problems regarding the non-appearance of different teams in different games, due to the spread of the infection among team members.

In the current season (2021-2022), 38 male teams registered into the competition that came back to the normal structure. The teams were divided into 6 series also for this season and the number of withdrawn team was counted again to 1, for the same financial reason.

Table 2. Situation of Juniors 1 – male along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	46	28	38
Number of withdrawn teams	1	1	1
Number of series	6	6	6

Analyzing the table above (Table 2), the lowest number of male teams registered in the juniors 1 competition was in 2020-2021. A difference of 18 teams less than in the previous season were counted between participants. When getting back to the normal structure of the season and with less expensive COVID-19 requirements, the number of registered team was higher than in the previous season, but still under the number of the teams participating in the 2019-2020 season. There were 10 more male teams than in 2020-2021, but 8 teams less than in the season started with no SARSV CoV-2 present.



Figure 1. Comparison between participating team in Juniors 1 male and female competitions during the last 3 seasons

In the figure above (Figure 1), using the chart representation, the accounting of the competition held for both male and female, Under 19 is presented. The total number of teams participating in the mentioned competitions was 81 in 2019-2020, 50 in 2020-2021 and 84 in 2021-2022. The most COVID-19 restrictions' affected season (2020-2021) had with 40% less teams than in the previous year, while in the current season the participation exceeded the one before COVID-19 with 3 more teams.

Juniors 2 (Under 17)

At the time of the establishment of the state of emergency on the Romanian territory, the competition season of Juniors 2 – female ongoing. The structure of the competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” and “Hope” Groups and Final Tournament (“Value” and “Hope”). The number of registered teams in the female sector was up to 62, divided during the geographical groups into 8 series. The number of withdrawn teams registered before the lockdown was 5, due to the various financial problems.

During the next season (2020-2021) the structure of the competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” Groups and Final “Value” Tournament, carried out only in tournaments, as following:

- 27-31.01.2021 and 10-14.03.2021 – tournaments that scheduled the Home and Away Geographical Groups
- 02-04.04.2021 and 21-23.05.2021 – tournaments that scheduled the Home and Away “Value” Main Groups
- 09-13.06.2021 – Final “Value” Tournament

There were 44 female teams registered in the 2020-2021 season, ready to bear all extra costs regarding COVID-19 conditions. The teams were divided as in the previous season, into 8 series. No team withdrew after the start of the season, but many teams faced problems with COVID-19 infection and were forced not to show up for different games. In this situation, the team in question lost the game with 10-0.

In the current season (2021-2022), 50 female teams registered into the competition that came back to the normal structure. Once again, the teams were divided into 8 series and there were no withdrawn team counted.

Table 3. Situation of Juniors 2 – female along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	62	44	50
Number of withdrawn teams	5	0	0
Number of series	8	8	8

As observed in the table above (Table 3), the lowest number of female teams registered in the juniors 2 competition was in 2020-2021, the season with the most and heaviest pandemic conditions. 18 teams couldn't handle the most expensive season ever and decided not to register and participate. When getting back to almost normal handball activities, with relaxed COVID-19 requirements, the number of registered team was higher than in the previous season, but lower than in the first analyzed season. There were 11 less female teams than in 2019-2020 and 14 more female teams than in the previous season.

When talking about Juniors 2 – male sector, the 2019-2020 competition season has the same structure as the female sector: a system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” and “Hope” Groups and Final Tournament (“Value” and “Hope”). The number of registered male teams was up to 52, divided during the geographical groups into 6 series. There was registered the withdraw of 2 teams before the lockdown, from different reasons.

During the next season (2020-2021) the structure of the male Juniors 2 competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” Groups and Final “Value” Tournament, carried out only in tournaments, as following:

- 24-28.02.2021 and 24-28.03.2021 – tournaments that scheduled the Home and Away Geographical Groups
- 23-25.04.2021 and 21-23.05.2021 – tournaments that scheduled the Home and Away “Value” Main Groups
- 16-20.06.2021 – Final “Value” Tournament

There were only 30 male teams registered in the 2020-2021 season, ready to bear all extra costs regarding COVID-19 conditions. The teams were divided into 6 series. No team withdrew after the start of the season. Also, this competition faced problems regarding the non-appearance of different teams in different games, due to the spread of the infection among team members.

In the current season (2021-2022), 41 male teams registered into the competition that came back to the normal structure. The teams were divided into 8 series, but the number of withdrawn teams was higher, 3 teams being registered to quit the competition due to the same financial reason.

Table 4. Situation of Juniors 2 – male along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	52	30	41
Number of withdrawn teams	2	0	3
Number of series	8	6	8

In the figure below (Figure 2), using the chart representation, the accounting of the competition held for both male and female, Under 17 is presented. The total number of teams participating in the mentioned competitions was 114 in 2019-2020, 74 in 2020-2021 and 91 in 2021-2022. The most affected season by coronavirus restrictions (2020-2021) had with 35% less teams than in the previous year, while in the current season, even if the number of teams was increased, it didn't reach the value from the first analyzed season. Still a percentage of 20% less teams registered in comparison with the year that started with no COVID-19.

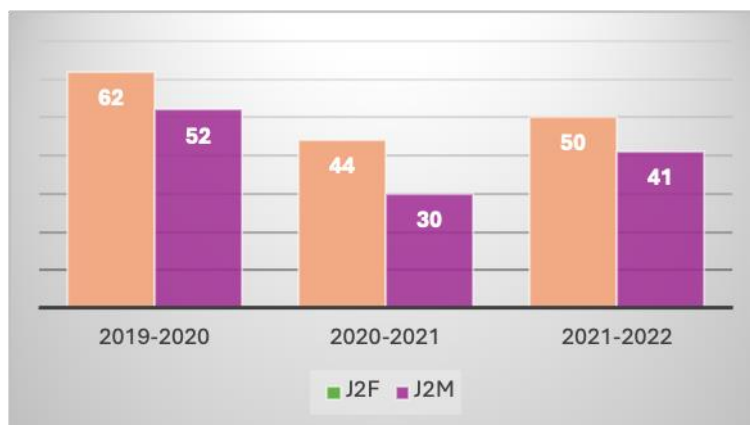


Figure 2. Comparison between participating team in Juniors 2 male and female competitions during the last 3 seasons

Juniors 3 (Under 15)

At the time of the establishment of the state of emergency on the Romanian territory, the competition season of Juniors 3 – female was also in full swing. The structure of the competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” and “Hope” Groups and Final Tournament (“Value” and “Hope”). The number of registered teams in the female sector was up to 86, divided during the geographical groups into 8 series. The number of withdrawn teams registered before the lockdown was 4, due to various reasons.

During the next season (2020-2021) the structure of the competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” Groups and Final “Value” Tournament, carried out only in tournaments, as following:

- 03-07.02.2021 and 07-11.04.2021 – tournaments that scheduled the Home and Away Geographical Groups
- 12-16.05.2021 – tournament that scheduled the Home and Away “Value” Main Groups
- 02-06.06.2021 – Final “Value” Tournament

There were only 49 female teams registered in the 2020-2021 season, ready to bear all extra costs regarding COVID-19 conditions. The teams were divided into 12 series. No team withdrew after the start of the season, but many teams faced problems with COVID-19 infection and were forced not to show up for different games. In this situation, the team in question lost the game with 10-0.

In the current season (2021-2022), 83 female teams registered into the competition that came back to the normal structure. As in the previous season, the teams were divided into 12 series and there was no withdrawn team counted.

Table 5. Situation of Juniors 3 – female along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	86	49	83
Number of withdrawn teams	4	0	0
Number of series	8	12	12

As observed in the table above (Table 5), the lowest number of female teams registered in the juniors 3 competition was in 2020-2021, the season with the most and heaviest pandemic conditions. 37 teams couldn't handle the most expensive season ever and decided not to register and participate. When getting back to almost normal handball activities, with relaxed COVID-19 requirements, the number of registered team was very close to the first analyzed season. There were 34 more female teams than in 2020-2021 and 3 less female teams than in 2019-2020.

When talking about Juniors 3 – male sector, the 2019-2020 competition season of has the same structure as the female sector: a system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” and “Hope” Groups and Final Tournament (“Value” and “Hope”). The number of registered male teams was up to 54, divided during the geographical groups into 8 series. There were counted 4 withdrawn team before the lockdown, due to financial problems.

During the next season (2020-2021) the structure of the male Juniors 3 competition was in the system of Home and Away Geographical groups, Home and Away Main Groups – spread in “Value” Groups and Final “Value” Tournament, carried out only in tournaments, as following:

- 10-14.02.2021 and 10-14.03.2021 – tournaments that scheduled the Home and Away Geographical Groups
- 09-11.04.2021 and 14-16.05.2021 – tournaments that scheduled the Home and Away “Value” Main Groups
- 09-13.06.2021 – Final “Value” Tournament

There were only 27 male teams registered in the 2020-2021 season, ready to bear all extra costs regarding COVID-19 conditions. The teams were divided into 6 series. Only one team withdrew after the start of the season, due to financial problems. Also, this competition faced problems regarding the non-appearance of different teams in different games, due to the spread of the infection among team members.

In the current season (2021-2022), 51 male teams registered into the competition that came back to the normal structure. The teams were divided into 8 series and the number of withdrawn team was counted to 1, for the same financial reason.

Table 6. Situation of Juniors 3 – male along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	54	27	51
Number of withdrawn teams	4	0	1
Number of series	8	6	8

In the figure below (Figure 3), using the chart representation, the accounting of the competition held for both male and female, Under 15 is presented. The total number of teams participating in the mentioned competitions was 140 in 2019-2020, 76 in 2020-2021 and 134 in 2021-2022. The most affected season by coronavirus restrictions (2020-2021) had with 46% less teams than in the previous year, while in the current season, even if the number of teams was increased, it didn't reach the value from the first analyzed season, were the number of teams was with 7 points higher.

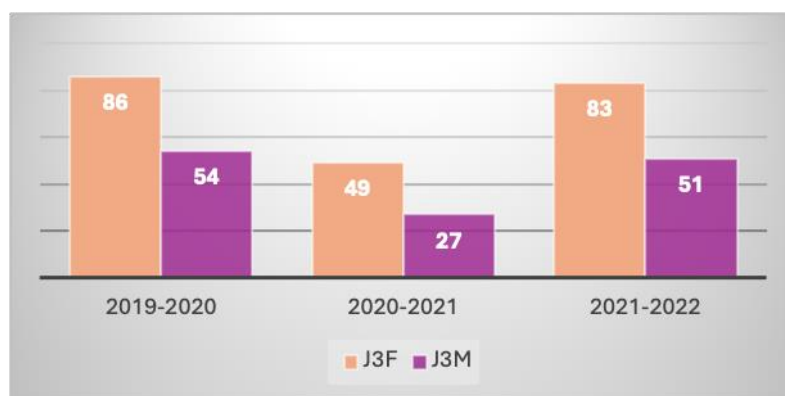


Figure 3. Comparison between participating team in Juniors 3 male and female competitions during the last 3 seasons

The importance of a large number of teams participating in Juniors' competitions is well known, given that the remarkable results at the senior level can only be hoped for if the number of handball players is higher, so that there can be a wide range of selection for national teams. However, the public authorities and other private investors are more interested in investing money in high level senior competitions, with the construction of the junior-level pyramid not a priority. Thus, it could be easily seen that of all handball competitions, the most affected by the appearance of COVID-19 pandemic were the Juniors' competitions.

335 teams were involved in the handball competitions for juniors in the season that started without announcing any problems or unexpected events. Due to the restrictions and hard conditions imposed by the authorities in the long fight against the prevention of the SARS-CoV-2 spread, in the season 2020-2021 the total number fell sharply down to 200 teams. With the return to competitions closer to the reality we were used to, with the relaxation of the conditions of participation in connection with medical reasons, the number increased again, approaching the initial number of participating teams, but still not reaching it. 309 teams were counted to be registered in 2021-2022 competition season, with 109 teams more than in the previous year and 26 teams less than in the 2019-2020 competition season. The situation described it can also be observed in the table below (Table 7).

Table 7. Situation of all Juniors competitions along 3 competition seasons

Characteristics	Season 2019-2020	Season 202-2021	Season 2021-2022
Number of participating teams	335	200	309
Number of withdrawn teams	18	1	5

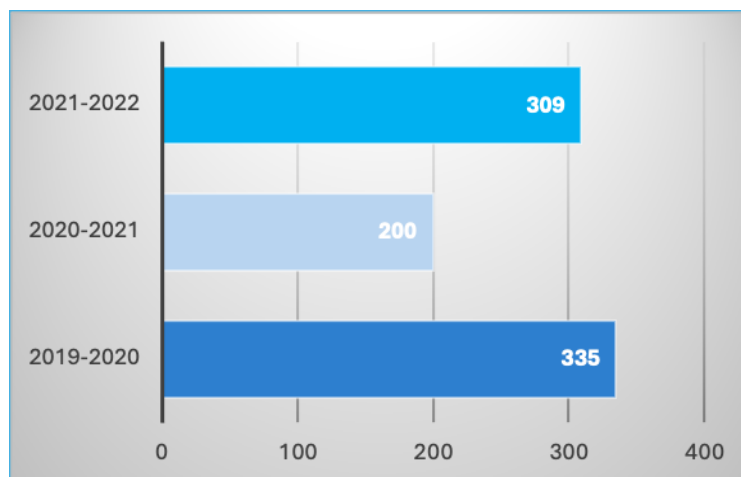


Figure 4. Comparison between participating team in all juniors' competitions during the last 3 seasons

In the figure above (Figure 4), using the chart representation, the comparison between all 3 analyzed seasons is shown, regarding the number of all Juniors participating teams. The most affected season by coronavirus restrictions (2020-2021) had with 41% less teams than in the previous year, while in the current season, even if the number of teams was increased with 45% compared to the “COVID-19” season, the participation didn't reach the value from the “no COVID-19” start of the season (2019-2020). There is still a lower number, with 8% less participating teams.

Discussions

Almost 5 years after the appearance of this virus that derailed life in general from a normal course and since then a lot of studies were conducted to analyse the impact of coronavirus on sports life, regardless of sport branch, age category or performance level. Barbosa et al (2020) discussed about the impact of pandemics on sporting events worldwide and high performance athletes, same as Koshle and Kaur (2020), Nauright et al (2020) or Garcia et al (2020).

Also for the domain of handball, the impact of the pandemic was widely debated and analyzed. Many studies are discussing about the changes in trainings and life in the covid time, with both junior and senior players under the radar of the specialists. Mon Lopez et al (2020) concluded that for a number of 189 spanish handball players, COVID-19 isolation caused reduction in training volume and quality of sleeping, psychological components having a significant impact on training and recovery conditions. Asai et al (2023) found out that the training sessions of japanesse youth players were reduced in 66,7% of teams during pandemics, while 45,8% of the teams reduced the intensity in trainings. Font et al (2021) discovered that aerobic capacity was affected after lockdown, for 11 national team male handball players, while Gadzic et al (2021) studied the impact of pandemic on morphological and cardiovascular status of professional handball players. However, we could not find comparisons between participating in handball competitions for junior teams during the covid years.

Conclusions

The COVID-19 pandemic has put the world we live in under enormous pressure, affecting every individual live and changing our patterns forever. Unprecedented measures taken worldwide to flatten the infection curve have included various extreme measures such as lockdown, travel restrictions, online meetings instead of face-to-face meetings, working from home.

If the physical exercises and sport was usually considered to prevent and fight disease and reduce the risk of getting ill, in the coronavirus era it was seen as helpless as any other sector of our lives.

Due to the restrictions and conditions imposed in the state of emergency established also in Romania, and later in the state of alert, all sports competitions from our country suffered, including handball competitions which are held indoor and especially the juniors' competitions.

At first, the Romanian Handball Federation was forced to close the juniors handball competitions without having a winner, without drawing up the final ranking and without awarding medals.

The hope of returning to a normal handball life was dashed when the state of alert was established which would last almost 2 years. Looking back, we can only be happy with the fact that after a long time, the sports' competitions could be resumed, but the conditions imposed for participation were far from normal. An entire competition season took place in the form of “bubble system” tournaments and without the presence of spectators in the stands, as befits any sports competition that has supporters, whether it is the parents of children practicing handball, or people who love the phenomenon and want to follow it. More than that, the conditions imposed by the medical protocol to prevent the spread of the virus have incurred expenses over the possibilities of many teams that were forced to accept a one-year break, without participating in competitions. Because of this, many children who practiced handball gave up this sport permanently, choosing activities that were possible in conditions of social distancing.

In the season 2019-2020 which began normally and without foretelling unforeseen events and situations, gathered at its start of handball competitions for juniors in Romania, a total number of 335 teams: 81 teams involved in Juniors 1 (Under 19) competitions, 114 teams involved in Juniors 2 (Under 17) competitions and 140 teams involved in Juniors 3 (Under 15) competitions.

The 2020-2021 competition season came with a lot of COVID-19 restrictions and requirements and was conducted over 5 months, instead of the normal season which is usually lasting 10 months. There has been a drastic decrease in the number of registrations. Only 200 teams could bear the extra costs resulting from COVID-19 testing, travel, accommodation, and meals necessary for being a part of the “bubble system” tournaments: 50 participants in Juniors 1 (Under 19) competitions, 74 participants in Juniors 2 (Under 17) competitions and 76 participants in Juniors 3 (Under 15) competitions. 135 teams were forced to sit over, due to the extra expenses and had a 1 year-break from handball competitions.

The return to a handball life closer to normal was achieved with the start of the 2021-2022 competition season, when the COVID-19 restrictions were still in place, but more relaxed. The usual structure of the juniors' competitions has been returned and RT-PCR testing has been replaced by less expensive antigen testing. These new conditions of participation encouraged the teams to re-register and there was a clear increase in the participation in each Juniors'

category. A total number of 309 teams participated in the competitions held for juniors in Romania: 84 participants in Juniors 1 (Under 19) competitions, 91 participants in Juniors 2 (Under 17) competitions and 134 participants in Juniors 3 (Under 15) competitions. The number means an increase of 109 teams in the current season.

Even if the state of alert is now history, it cannot be said that the danger of infection with COVID-19 have totally passed. We must continue to be extremely careful, at least because nobody wants to return to any restrictions that affect sports activities and competitions that have already suffered greatly. It takes time to fully return to a normal life and only time can tell when the impact and damages of the pandemic will be completely over.

Acknowledgement

All authors have equally contributed to this study and should be considered as main authors.

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