

## How the Germans Are Using the Football Talent Management Program

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### Abstract

**Purpose:** Today, in many developed countries, talent management throughout is the long-term process, under the supervision of expert executive managers and coaches, has been done and is an important concept in football. Therefore, in many developed countries, talented people can come to talent programs and received trained continuously to become professional players. **Method:** In this study, based on German's football talent management program, and procedure informed by Sandelowski and Barroso's qualitative meta-synthesis. **Results:** The suggested model has three sections: 1- hardware system, 2- software system, and 3- many subsystems that are collaborating in an executive context. Achievements of this program are not just the detection of talented young players at an early age, but rather a long-term process that is a high-level management program, which, for full success, requires collaboration between many organizations such as the government, football association, football leagues, clubs, academies, education schools, football schools, coaches, and players. **Conclusions:** According to results, the growing process of this cycle and its periodic revision show the brilliant future of the German football community in gaining championship and promoting the national identity of Germany over the years. We hope that by studying this system we can introduce it to the researchers and officials in developing countries, who are interested in furthering a developmental view of football.

**Keywords:** German Football Association, German Football League, Talent Identification, Talent Development, Meta-Synthesis

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## INTRODUCTION

Regarding its effects on society, football is probably the best and most popular sport in the world (Fernandez-Rio & Méndez-Giménez, 2014; Orosz, 2015). Today, football is not just a sport, and its status has been undergoing ever-growing changes and expansions due to economic, social, cultural, and even political impacts. Such that there are few societies around the world not influenced by it. Due to this, not only young men and women, but also governments, organizations, investors, and huge groups of people are interested in it. Furthermore, participation in World Cup competitions and the acquisition of a higher status among other countries brings individual credits to governments and societies (Bennett, Vaeyens, & Fransen, 2018). The popularity of football among young people all over the world (Fernandez-Rio & Méndez-Giménez, 2014), has caused the development of youth football to be an essential goal of governing bodies in any country in the field of football (Mrkonjic, Poli, Boillat, & Tallec Marston, 2016). As we know in sport, maintaining a gained position is harder than to obtain it for the first time. So necessary attention to this statement requires countries to develop Talent Identification (TID) and Management Programs. "It's imperative that, as soon as possible, young people are identified and continuously helped to reach high levels of skills," says Brown (J. Brown, 2001, p. 149). Identifying a talented athlete is very complicated and in aggressive games like football even harder (Fernandez-Rio & Méndez-Giménez, 2014). So this approach must be used in the management of football talent (Orosz, 2015). If recognized football talented players between the ages of 8 to 10, they will be at the best level of their abilities at 20 years old. Developing essential skills at an early age, and reaching this level of elitism, will make players more likely to attain high levels of athletic performance. Thus, the professional life of players will be longer, and their lifetime value (CLV) will increase. This by itself is an element to further developing the football industry (Doostdari, Ashraf ganjoui, & Soheily, 2015).

For these reasons, most countries would like to profit from the benefits of football development in their society. Today, football management, like any other important sphere of influence, is executing very professionally and scientifically. Governments, along with many social, cultural, political, and economic institutions, can obtain profits

via appropriate management of this program. So, they intend to invest in young people to discover and identify talented players, growing and maintaining them, and ultimately turning them into professional players. Germany is among the world's leading countries football, which in recent years, has had comprehensive management in this field. The beginning of the DFB talent and elite development program was started after poor results in the 1998 World Cup and Euro 2000 (Schmidt & Stegmann, 2016). The German Football Association, the Deutscher Fußball-Bund (DFB), launched a strategy to rebuild its professional foundation, whose result was a 10-year plan for succession to the world championship in 2014 for Germany (Gagnon, 2014). Some reasons which led to the victory of Germany in the 2014 World Cup are Development of professional structures in youth football, the certification licensing of German Football League (DFL); a comprehensive support system of talented players, DFB regional bases; centers of excellence; ensuring Comprehensive educational process through cooperation between schools and clubs and nurturing a new generation of excellent technical and tactical talents (Schmidt & Stegmann, 2016). During the last two decades, the German talent program has been very successful. Germans achieved this success in collaboration with numerous organizations. Some of which include: Specific attention to establishment and development of infrastructures, close cooperation between DFB and DFL, valuable role of the government in the consolidation of the solidarity between the organizations involved in this project, widespread use of specialists throughout Germany, cooperation with international organizations in this field, and expansion of tournaments and talent scouts to all states, regions and small cities in Germany and appropriate management solidarity between all these areas through adequate acts and timely supervision. Hence, Germany has been able to draw the attention of other countries including China (Ringrose, 2017), Australia (Staff Writer, 2017), AFC (Osman, 2013), Philippines (Tupas, 2011), French (DFB, 2007), UK (Parliament, 2011) and the US (Deutsche Welle, 2007) to this new plan. The goal of all developed countries or developing countries in football is to get success at international levels. Although sometimes they can compete at international standards, but often cannot continually guarantee their success (Bennett et al., 2018). It seems that, when there is not an efficient and systematic TID program, the talents

will never be identified or will identify too late, which causes players to miss the optimal time and not result in the best efficiency. The importance of timely identification of talents, for the players and the club, is an increase in the CLV of players. These players can also enter as substitute players to national teams. Therefore, studying the programs of TID in developed countries can provide valuable insight for other countries as to how they structure their talents pathway (Bennett et al., 2018). So to this purpose, we aim to study German's football talent management program. Researchers want to answer these questions: what are the Support Systems (or hardware) for DFB talent and elite development program? How is the cooperation between organizations and institutions involved in this program? What are the executive plans in this program? What is the final model of these programs?

World Cups 2006 and 2010 were the starting points for changes by the **French Football Federation** (FFF) and clubs. The FFF uses managers active in 21 regions to run programs and establish youth academies mandatory for all first-level professional teams. Such that players are identified from the age of 11 and at age 13 enter the national training centers (Stahl, 2000), schools specializing in sports, pre-training centers. Eventually, the professional clubs academy educates under the supervision of coaches in coaching schools (Ofthedoor, 2013). Also, there are two youth educational programs for 6 to 11-year-old players and a youth national identification program for the youth national teams 16 to 18 years old in France (Stahl, 2002). The clubs also have a weekly plan in this process (Stahl, 2001) and currently 35 full-time programs run by professional clubs (Kennedy, 2017). Every year, the FFF ranks the youth academies of clubs (Lyttleton & Eastham, 2018). A large number of talented players have trained in this program. Then some of them selected by the coaches to play in the national team. They won the 2018 World Cup (Long, 2018).

In 1997 in **England**, the Football Association (FA) implemented a charter of quality (Wilkinson, 1997). In 2010 the Premier League clubs, in cooperation with representatives of the Football league, founded the Elite player performance plan aimed at the modernization of the academy system (Premier League, 2011). In this regard, the FA and clubs made enormous investments in the construction and development of facilities, recruiting staff, and facilities for young players (Lewis, 2007). Also, FA

executed various courses for the promotion of coaches. Also, programs have implemented in schools with the aim of football development (Howie & Allison, 2015). Youth aged between 8-18 are training in professional club academies (Crane, 2017). In this regard, the operation of clubs is overseen by Double Pass (Premier League, The Football League, & Double Pass, 2014). The football academies and some performance centers provide facilities needed and the necessary support for young players (Crane, 2017; Lewis, 2007). As a result of this program, they achieved the championship in U-19 Euro 2017 and U-17 and U-20 World Cups at the same time (Long, 2018).

In **the Netherlands**, a comprehensive program is in a process that has two sections: creating opportunities for young players with high performance, and for those that haven't had severe activity in this field but may be interested in it after continuing training. This program is dividing into two groups: children (pupils) and a junior-aged 5-18 in eight classes in each group (Poel & Hyballa, 2011). To this end, the Royal Dutch Football Association (KNVB) academy trains thousands of coaches at all levels (KNVB, 2019). Talented young players are trained in the best academies like Ajax (Ajax, 2019) and compete in the youth leagues in groups of ages 6-19 in 6 regions (KNVB, 2010). Football Academy Development helps football clubs improve the structure of their youth academies (FAD, n.d.). The Dutch football players and coaches provide high-quality training to players in camps, tours, and clinics. The Netherlands association and clubs with the cooperation of Sports scientists are trying to provide a method for talent identification (Poel & Hyballa, 2011). Therefore, it seems that despite the similarities in methods of talent management in leading countries, there are also differences that make us interested in studying these processes in a prosperous country like Germany. As a total, the upward trend in the success of the Germans in managing talents has made others interested in learning more about this program. In Iran, many talented young people aspire to achieve high levels of professional football in football. In many cases, these young people are not only unrecognizable but can never play at high levels of football. On the other hand, the growth and development of talents can play a significant role in rejecting the survival of clubs, promoting the attractiveness of Iranian football leagues, and the growth and development of the country's football industry. The benefits of

developing the country's football are innumerable. But what is essential is to take advantage of the experiences of leading and prosperous countries in this field to pay attention to the growth and development program of the country's young football players. A proper general understanding of this program and the relationships governing the components can be more exciting and gets more attention from football managers in other countries. Because of many reasons, for example, the great usefulness of this program and gaining the experiences of German managers in setting up a proper plan in this field, we hope we can use these results to help in optimizing current programs in other interested countries.

## **METHOD**

To do this study, we followed a procedure informed by Sandelowski and Barroso's qualitative meta-synthesis. This method is a systematic review and integration of the findings of qualitative researches (Sandelowski & Barroso, 2007). In research conducted in a more sophisticated way, the researcher does not necessarily seek innovation. But this method has used to extract all the details and relationships in this program from many sources and executive reports and put together. In short, the innovation of this research has been to depict a comprehensive and sophisticated program in the development of German elite football and to introduce it to other researchers.

### **Formulating research goals**

In this method, the first step is setting the goals of the research. We set four goals for this study mentioned above. Also, after determining the purpose, we must set the parameters for search including what (the initial topic), who (community), when (temporal) and how (methodological). What: Refers to the initial topic, studying GTEDP. Who: Represents the studied documents. In this research, documents include books, articles, dissertations, pdfs, web pages, videos, photos related to this study. When: Defines the period of research. Documents searched were initially between the years 2000 and 2018. How: Refers to the method, which is a meta-synthesis approach with six stages (Sandelowski & Barroso). These parameters constitute the inclusion and exclusion criteria in this research.

## Literature search

In this stage, research keywords are selected. Research keywords were included: DFB talent and elite development program, DFB regional bases, centers of excellence, youth academies, football schools, elite football schools, regional associations, boarding schools, IFX residential academy, DFBnet, DFB 29 coordinators, coaching standards, Double Pass, Local players rule, 50+1% rule, agent and sports agencies, etc.

## Screening and selecting the appropriate documents

The initial search took place on 27th June 2017 and returned 938 records (see Figure 1). The first stage of screening involved reviewing all of TID documents and removing the types of documents not related to GTEDP (books, articles, etc.). Following the initial screening and selection procedure, 605 documents were retained. The second stage of screening yielded 529 documents. Documents were included from these sources: articles, pdfs, web pages, interviews conducted with experts and executives of this program in Germany, books, dissertations, and published resources in scientific conferences. Documents not matching the purpose of this research or the keywords were excluded and only 96 documents were reviewed. Finally, results from the second search conducted on 9 April 2018 were subjected to the same procedures (see Figure 1). The second search produced 16 documents. Therefore, a total of 110 documents were analyzed.

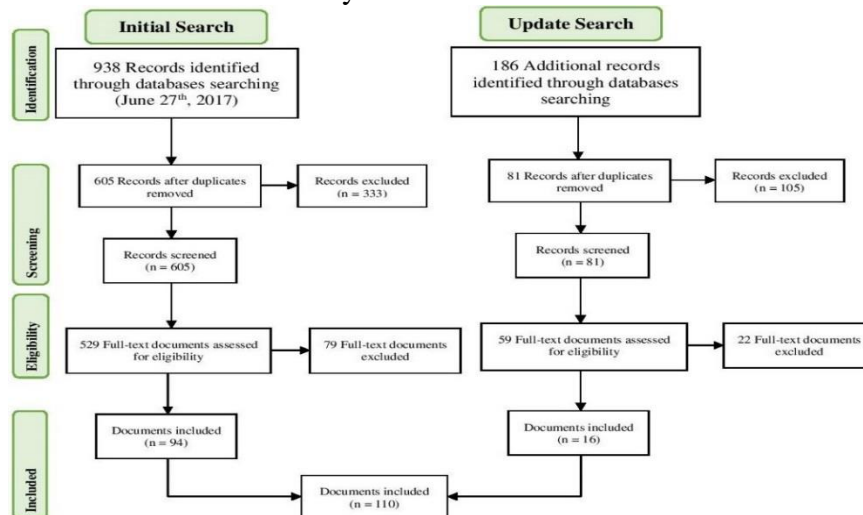


Figure 1: Meta-synthesis review flow chart (Moher, Liberati, Tetzlaff, & Altman, 2009)

### **Analyzing and synthesizing the qualitative findings**

At this stage, the grounded theory method was used to code the documents. Thus, each document was assigned a number, and for all information in each document, one code was considered. Then, considering the concept of each code, we put it in the category with similar codes. With coming together of the concepts, the categories emerged.

### **Validity**

For control of the extracted codes' descriptive validity and to confirm the final model, we used two experts' peer review.

### **Presenting the findings**

Based on the research study and the codes extracted from Phase 5, the three-part model of talent management in Germany was obtained. For constructing the model the Glaser approach was used and to display the relationships and processes existing between these 3 parts, have used Glaser's type, process, and interactive family (Glaser, 1978).

### **Quantitative research part**

Shannon Entropy was used to calculate the degree of importance of each category in the final model. Shannon entropy measures the amount of information in a variable (Vajapeyam, 2014). In this method, first, the number of open codes in proportion to each document and their repetition are counted. Then, by using the information load for each category and equations (1) and (2), the significance of each one is calculated.

$$\text{Formula (1): } E_j = -K \sum_{i=0}^n (P_{ij} * \text{LN } P_{ij}) \quad i = 1, 2, \dots, n \quad K = \frac{1}{\ln(n)}$$

$$\text{Formula (2): } W_j = \frac{d_j}{\sum d_j} \quad d_j = 1 - E_j * 100$$

In this study, we used Shannon Entropy (SE) that is a quantitative method to verify the qualitative part. This method not only provides a quantitative report from qualitative results but has also used for validation of the findings.

## **RESULTS**

Here is a table showing sample codes, resources (author and year of publication), the selected codes (concepts), and theoretical codes (category) (See Table 1).



**Table 1:** Overview of meta-synthesis results

Category	Concepts	Authors (Date)
Actions are taken of DFB & DFL	Comparative Study	Han (2016), Hesse (2016), Ermisvfland (2014), Schmidt and Stegmann (2016), Price (2015), Mendonça (2014), Bender, Schild, and Schweizer (2011), DJW (2011), (Kulish, 2012), Malone (2014), James (2013)
	Cooperation DFB & DFL	Ming (2017, December ), Englisch et al. (2016), Güllich (2014), Kim (2008)
	Actions taken of DFB	Chesler (2013), (DFB, 2015a), Tschan (2008)
	Establishment of DFB regional bases	Grossmann, Lames, and Stefani (2015), Schmidt and Stegmann (2016), Price (2015), Dieter Drewitz et al. (2009), ESTO (European Synthetic Turf Organisation) (2017), (DFB, n.d.), Stöber (2017), Chesler (2013), Hackbarth et al. (2013), Deutsche Welle (2016), Bender et al. (2011), Mendonça (2014), (DFB, 2015b), Hesse (2016), Weiss (2013), Alagic (2017), DJW (2011), Lindberg (2015), Coerver (2019), (Kulish, 2012), Malone (2014), James (2013), Schmitt (2015), Fundação Real Madrid (2014), Honigstein (2015), (Cairns, 2013), Rose (2016)
	The hiring of 29 DFB coordinators	(DFB, 2015b), Alagic (2017), Rose (2016)
	Financial investment	Grossmann et al. (2015), Price (2015), Schmidt and Stegmann (2016), ESTO (European Synthetic Turf Organisation) (2017), Chesler (2013), (DFB, 2015a), (DFB, 2015b), Hesse (2016), Goalzz (2010, July 6), Alagic (2017), Lindberg (2015), DJW (2011), (Kulish, 2012), Dieker (2017), Schmitt (2015), Rose (2016)
	Revision of the coaching system	Güllich (2014), Price (2015), Schmidt and Stegmann (2016), Dieter Drewitz et al. (2009), ESTO (European Synthetic Turf Organisation) (2017), (DFB, n.d.), Stöber (2017), Chesler (2013), Hackbarth et al. (2013), Bender et al. (2011), Norman et al. (2015), Englisch et al. (2016), Mendonça (2014), Kim (2008), Hesse (2016), Weiss (2013), Alagic (2017), DJW (2011), Coerver (2019), Malone (2014), Fundação Real Madrid (2014), Honigstein (2015), Rose (2016), Abraham (2018), Simon (2015), Grohmann (2014)
	Obligation to establish youth academies	Grossmann et al. (2015), Grossmann and Lames (2013), Price (2015), ESTO (European Synthetic Turf Organisation) (2017), Stöber (2017), Chesler (2013), Bender et al. (2011), Mendonça (2014), Gagnon (2014), Ermisvfland (2014), Schmitt (2015), Whitney (2013),
	Establishment of academies committee	Bender et al. (2011), Mendonça (2014), Price (2015)

Category	Concepts	Authors (Date)
	Obligation to establish centers of excellence	J Van Hoecke et al. (2011), Schmidt and Stegmann (2016), Dieter Drewitz et al. (2009), (DFB, n.d.), Hesse (2016), Fundação Real Madrid (2014)
	TID and long-term nurture in talent promotion (TP) programs	Güllich (2014), Votteler and Honer (2014), Kim (2008), Feichtinger (2015)
	Establishment of DFBnet	(DFB, 2013), (DFB, 2016)
	Foot Pass project	Vubtechtransfer (2016, October 26), Double Pass (2013)
	Establishment of elite football schools	Grossmann et al. (2015), Stöber (2017), Hackbarth et al. (2013), Englisch et al. (2016)
	Establishment of elite football academies	Schmidt and Stegmann (2016)
	U19/ U17 Bundesliga	Grossmann et al. (2015), Norman et al. (2015), Weiss (2013)
	Establishment of Mini Pitches or Soccer Ground	ESTO (European Synthetic Turf Organisation) (2017), Chesler (2013), Bender et al. (2011), Norman et al. (2015), Price (2015), Mendonça (2014), Gagnon (2014)
	Obligation to run Local player ruling	Grossmann and Lames (2013), Niemann and Brand (2008), Schmidt and Stegmann (2016), Bender et al. (2011), Mendonça (2014), Schmitt (2015)
	Certification of academies	Grossmann et al. (2015), J Van Hoecke et al. (2011), J Van Hoecke, Schoukens, Lochmann, and Laudenklos (2008), J Van Hoecke, Schoukens, Simm, Isakowitz, and Sutter (2010), Schmidt and Stegmann (2016), Price (2015), Mendonça (2014), Stöber (2017), Double Pass (2013), Chesler (2013)
	U15 Junior regional league	Schmidt and Stegmann (2016)

The other documents were used, have shown in Table 2.

**Table 2:** Other references for DFB talent and elite development program included the review

Category	Authors (Date)
DFB talent and elite development program	Learn4good (2019)
	Wikipedia (2019)
	Soccer Ground (2018)
	(IFX, 2018a)

Category	Authors (Date)
	(IFX, 2018c)
	(IFX, 2018e)
	(IFX, 2018b)
	(IFX, 2018d)
	Heidelberg University (2016, March 31)
	Votteler and Höner (2017)
	Mann, Deghansai, and Baker (2017)
	(DFB, 2017)
	Bundesliga (2019)
	BVB (2017)
	Muzaffar (2017)
	Warnke and Sittl (2016)
	Guellich (2016)
	Admin (2015, March 31)
	Augste and Lames (2011)
	Jo Van Hoecke, Schoukens, Simm, and De Bosscher (2009)
	TSG 1899 Hoffenheim (n.d.)
	Best Score (n.d.)
	DTFS (n.d.)
	Fandom (n.d.)
	Abseits (n.d.)
	Köln (n.d.)
	Janzen (n.d.)
	Soccer Ground (n.d.)

In this section, the data analysis process consists of 3 stages, concepts, and categories (codes) and then the analysis of the DFB talent and elite development program presented. 110 Selected documents have analyzed. As a result of reviewing these documents, 1752 open codes in 293 concepts and 37 categories obtained.

As we mentioned above, to present a whole model of this program, we obtained 37 categories that have shown in Table 3.

**Table 3:** Categories

Number	Categories
1	Review of the present status in this field (related to 2000)
2	Identify officials of DFB talent and elite development program
3	Identify DFB and DFL activities to implement and develop the DFB talent and elite development program
4	DFB regional bases
5	Program coordinators
6	Financial investments
7	Coaching system
8	Youth academies
9	Centers of excellence
10	TID/ TP programs
11	DFBnet
12	Elite football schools
13	U19 /U17 Bundesliga
14	Soccer ground
15	Foot Pass / Double Pass
16	Football schools
17	Stages and levels of DFB talent and elite development program
18	The first stage of DFB talent and elite development program: basic development
19	The second stage of DFB talent and elite development program: talent development
20	The third stage of DFB talent and elite development program: elite development
21	Education Schools

Number	Categories
22	Regional associations
23	Relationship between the competitive levels of DFB talent and elite development program and youth league
24	Clubs
25	Successes and benefits of DFB talent and elite development program
26	Government
27	Legal issues
28	Agent and sport agencies
29	Support systems of the players
30	Cooperation between organizations
31	Executive management of DFB talent and elite development program
32	Relationship between the football industry and university
33	Facilities
34	Indicators of success or failure of the players
35	Exit indicators of the players from this program
36	Corrective actions during the implementation process of this program
37	Factors or reasons for the success of the German Football

Also, to determine the priorities of each group, we used SE. Then, we showed that the most critical role is DFBnet with the highest coefficient (See Table 4).

As shown in figure 2, by studying DFB talent and elite development program and reviewing existing relationships between the factors in this program, and based on the actions taken in this country between the years 2000 and 2018, the model obtained in 3 sections:

- In the first part of it, we can see that after the failures in 1998 in the World Cup and Euro 2000 matches, Germany noticed that it must revise football programs. To do this, they needed to build a strong relationship between the government, DFB, and DFL. In this section, they required some investments to develop many infrastructures such as DFB regional bases. They also needed cooperation with the Ministry of Education, DFBnet, and Double Pass. We named this part of the model as hardware systems.

- In the second part, we look at the many cooperation between these hardware systems. Therein, we can mention the actions of DFB and DFL, the executive management of DFB talent and elite development program, legal issues, the relationship of football industry with universities, coordinators, DFB regional bases, centers of excellence, football schools, and coaches.
- In the third section, issues related to executive programs of the DFB talent and elite development program, including three stages: essential development, talent development, and elite development. Many systems, institutions, and processes cooperate. These include competitive levels and the youth league, Bundesliga U17 / U19, youth academies, sports agencies, clubs, player's support systems, and cooperation between them. Due to a better understanding of the relations in the model, some colors selected, which have shown in figure 2.

Review of the present status in this field (related to 2000)

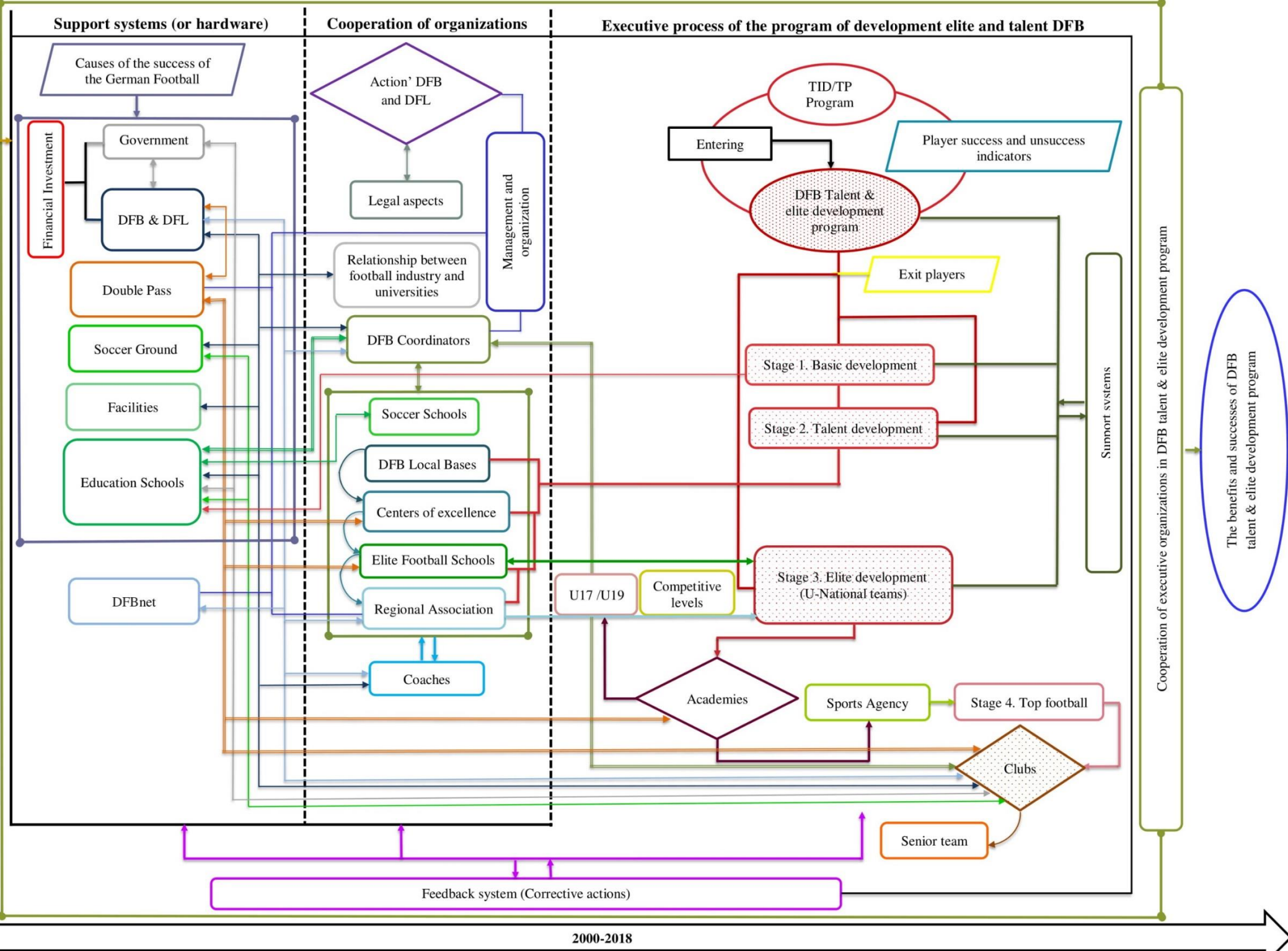


Figure 2: The German Football Talent Management Program Model





## DISCUSSION

As shown in Figure 2, which has three components:

### **Support system (hardware and software) of DFB talent and elite development program**

As we know, the German national football team in the 1998 World Cup and Euro 2000 showed a poor performance. From the researchers' perspective, weakness, lack of structure and organization of professional talent, lack of highly technical skilled youth players, and the high average age in players were the reasons for failure. This weakness detected by the DFB, which started a new plan for football. The project led DFB to make some decisions which are: Focusing on football at a new level, increasing investment on young players' development plan, creating a nationwide talent network, reforming technical systems of leveling talents of trainers and talent scouts, changing the philosophy of the game, recruiting more full-time trainers and modernizing educational facilities. These decisions led to the reform of the football TID system in 2001. This correction achieved through the collaboration of the DFB and the DFL.

The leading countries in football talent development plan, such as France (Kennedy, 2017, Jun 21; Stahl, 2002), England (ESPN Staff, 2017) and the Netherlands (KNVB, 2010) similar to Germany, should pay attention to the necessity of identifying the weaknesses and deficiencies in their football talent programs. Lack of qualified coaches, inadequate sports facilities, lack of sufficient opportunity for players to play in the homegrown competitive levels, the presence of a large number of foreign players in the league (ESPN Staff, 2017) and lack of attention to Talent Development (TD) clubs from childhood (KNVB, 2010) are aiming these weaknesses.

The government is one of the essential pillars of German's football talent management program. The German government, using legal advantage by interfering in the distribution of income between all football clubs, plays a vital role in progressing this program. Also, the FFF, in cooperation with the government, has built 32 football schools (W. Brown, 2013). To implement the DFB talent and elite development program, the DFB has made substantial financial investments for constructing centers of football, soccer ground, and player and coach

education centers. Furthermore, clubs have invested in youth academies and centers of excellence construction. The Premier League, with its funding partners, The FA, and the Government, invested in facilities across the football pyramid (Ernst & Young LLP, 2019).

One of the actions of DFB, intending to support DFL, regional associations, and football organizations, is constituting DFBnet. After the implementation of DFB talent and elite development program and reforming the system of licensing professional clubs by DFB and DFL, Double Pass evaluates the performance of club youth academies every three years based on eight criteria. These criteria are strategy and finance, organization and system, football education and assessment, support and education, personnel, communication and cooperation, infrastructure and facilities, effectiveness, and permeability. The developed and developing countries are cooperate in TID with Double Pass. In the UK, the performance of the Clubs' youth academies based on ten criteria (Premier League et al., 2014).

The other DFB actions in cooperation with regional associations of DFB in 2007 and by using proceeds from World Cup 2006 are the construction of 1000 soccer ground in 21 regions. Since youth football training should be parallel to school studies and maintaining the balance between these two plays a vital role in the development of talented players, the DFB has made a particular investment for football training in schools. Thus in Germany, there is good interaction and high cooperation between the Ministry of Education and the DFB. British football managers, like Germans, have noticed the importance of teaching children football. Therefore, in schools, implementation of programs has aimed at the development of girls' football, youth football, and developing skills of teachers to deliver football in schools (Howie & Allison, 2015). Other vital factors in DFB talent and elite development program are having a necessary infrastructure and sports facility suitable for the education and training of the players. Hence, after the beginning of the DFB talent and elite development program, many investments were made on constructing the DFB regional bases; local school building and construction of educational centers, renovation of stadiums and training centers were required. Furthermore, establishing youth academies and centers of excellence was made a priority in the DFB, clubs, and regional associations.

Besides, culture is the most crucial issue that must manage. Benefits from Media Influence and its advantage can be useful for this purpose. The other matters which must take into account were: legal issues, unique football techniques in Germany, changes in the education system and new technique usage, active participation of DFL in youth supports, the worthy role of Foot Pass in certifying the club academies, professional coaches, the talent bases and player development centers' aim to create an active scouting network throughout Germany, and DFB accurate planning are the most essential prime actions which made Germany successful in these programs.

### **Cooperation between organizations and institutions involved in DFB talent and elite development program**

Comparative studies by experts, construction of 366 DFB regional bases across the country (2002), the establishment of DFBnet at (2002), hiring 29 full-time coordinators, the requirement for installation of youth academies and centers of excellence to Bundesliga and Bundesliga2 clubs (2002-2001) and Bundesliga U19 (2004-2003) are the other actions in this field.

Furthermore, the Foot Pass Project started in 2005, and in 2006 elite football schools were constructed. In 2007, 1000 soccer ground built. From 2008 they also introduced academy certificates, employing local players rule, held the U17 Bundesliga, and held the U15 junior regional league in all regions of Germany. The other actions to implement this program are a massive financial investment from DFB, hiring specialists in coach education in different age categories. Moreover, to organize and create the necessary coordination to varying levels of DFB talent and elite development program, DFB has employed 29 full-time coordinators.

Legal issues are one of the most critical factors that affect German football and the talent and elite development program. Bosman law implementation in Germany has had a profound impact on the country's football and the poor results of the national team during the period of 1998 to 2000. The increase in the number of foreign players in domestic leagues and the reduction of their players' share in both the Bundesliga and in the European League has been a negative consequence of the implementation of this rule. Due to this, DFB and DFL co-worked to amend the licensing system for professional league teams, standardize

football rules and regulations, and improve legal structure. To this end, clubs to invest in the implementation of the program jointly to run training centers (youth academies and centers of excellence). Also, the application of 50+1% rule and the local player employing control are other mandatory rules of DFB, which has created an opportunity for young players.

The development of coaching standards at different levels, from grassroots to elite levels, is another critical DFB priority for implementing a DFB talent and elite development program. In this way, DFB will enhance B-level courses for training instructors by specializing them in different age groups and upgrading their educational skills. In co-operation with DFL, they will hold several coaching conferences. In other countries, there are also various coaching courses for this purpose. France has established coaching schools to create an integrated educational system (Stahl, 2002). FA executed the holiday coaching and coaching courses program to upgrade the coaching system (Howie & Allison, 2015; The Football Association, 2018). Also, the KNVB educates thousands of coaches in all age groups, from youth coaches to professional managers (KNVB, 2019). Also, DFB focuses on changing educational processes, along with DFB talent and elite development program, in football schools.

As we know, football schools play significant roles in three phases of the program through the establishment of school football centers as well as elite football schools. As a result, players in the nomination program will train in various schools, such as soccer camps, boarding schools, or International Fútbol X-Change (IFX) academies. Similarly, French players aged 13 to 16 are training at football academies (EduKick, 2019). At the age of 19, they have prepared for competing in the Youth Cup tournament "Coupe Gambardella" (W. Brown, 2013). Upper secondary students play in IFX for highly competitive college football school and youth or semi-pro/amateur British clubs (IFX, 2018).

The implementation of a DFB talent and elite development program has gone through a scientific approach. Such that as DFB has done joint projects with Sports Sciences Universities, to achieve better results for the program. It is for this reason that Dutch (Poel & Hyballa, 2011) and English (Premier League, 2012) football officials have also realized that cooperation with sports scientists is necessary to implement the TID

program. Other effective interventions include DFB and DFL's close collaboration in executive management of the DFB talent and elite development program. The golden key to the success of the German's football talent management program can sum up in this. However, to optimize the management process of the program, there is a high degree of coordination among all the organizations and institutions involved in this program. Similarly, all developed countries in football have recognized the importance of cooperation between the federation and the league (Long, 2018), working groups, coordinators and regional managers (Howie & Allison, 2015), and associations and clubs (KNVB, 2019) to continue to educate players and educate talented players.

### **DFB Talent and Elite Development Executive Program**

One of the reasons for the weakness of the German national team in 1998-2000 was the lack of young players with high technical skills. Thus, DFB, DFL, and clubs changed their approach and invested in the training of young and talented players. Following this change of strategy, the DFB talent and elite development program began four phases of primary development, talent development, elite development, and top football, in collaboration with DFB and DFL from 2001-2002. At the stage of crucial development, players aged 3 to 10 are trained in kindergartens and schools, as well as amateur clubs, and play football in their teams and clubs every day. At the stage of talent development, players between ages 11 and 14 are training in DFB regional bases, centers of excellence, elite football schools, and regional associations. The first step in implementing DFB talent and elite development program was the construction of 366 DFB regional bases across the country. A group of 11-14-year-olds come weekly from amateur clubs to these bases and are supervised by 1,300 coaches with DFB qualifications, in addition to their club training, and their progress is evaluating. These are the first stage in the growth of any talented player. After assessing the performance of these players, the best and most successful of them will introduce to centers of excellence, then they can continue in regional associations and teams, youth academies, and elite football schools. Ultimately, they are inviting to the youth national teams. Establishing centers of excellence played an essential role in this program as well as the continuous progress of the players. Providing training and advanced training conditions, targeting and selecting a large number of talented young players, and

raising them in different age groups is one of the goals of the construction of these centers. According to an agreement between DFB, DFL, and the Ministry of Education in 2006, the first elite football schools were established by DFB and in partnership with education schools and local clubs. In the next step of the second stage of DFB talent and elite development program, players enter to regional associations. In collaboration with these associations, DFB has created an effective scouting system. DFB talent and elite development program have five-level competitions, including DFB regional bases, centers of excellence, regional associations, youth academies, and youth national teams. German Youth League is holding in U7 to U19 age groups. Children and players involved in the TID program are continuously participating in various competitions by their age groups. Therefore, there is two-way communication between talent and youth leagues. The third stage of DFB talent and elite development program is elite development. At this stage, elite players (U15-U23) are training at academies of professional clubs and national youth teams. One of the primary goals of the program is the transfer of talented and promising players from the various levels of the application to the clubs. Hence, the role of these players is significant. In this regard, DFB and DFL signed a memorandum of understanding with the German Association of Football Players' Agents (DFVV). The European Football Agents Associations (EFAA) cooperate with the French (UASF), England (FAA), and the Netherlands' (Pro Agent) Agent Association (EFFA, 2017).

Players at different educational centers, who are in the 3rd stage of training, will upgrade to higher levels based on merit, to the fourth stage. In this program, they can enter professional football clubs and national teams. Similarly, in France, England, and the Netherlands, these programs also include multiple stages. Also, the French program consists of four steps in groups of 6 to 18 years old (Stahl, 2000; 2001, 2002). The English program consists of 4 levels (Premier League, 2012), and the Netherlands program is two stages (5-18 years old) (Poel & Hyballa, 2011). One of the interesting points of the German football qualification program in different age groups is that this program does not have an exit system, and players with any level of capacity always have a chance to attend this program. Due to this, their withdrawal is voluntary. The

reasons for this are fatigue, excess pressure of their activity in school and football, or injury.

Creating opportunities for children to grow in a pathway of their talent, helping talented young players to become professional players, boosting the number of young players and academic abilities in Bundesliga and the national team, reducing the average age of the German national team and the Bundesliga clubs and the team championship among the various age groups of Germany are among the advantages and successes of the program. To increase the continued motivating presence of talented players in this program, and preventing their departure from it, the existence of supportive systems for players is an essential requirement in the program. As such, the DFB talent and elite development program have a reliable support system for all players in the program. Also, France (Stahl, 2000, 2002), Britain (Crane, 2017; Lewis, 2007), and the Netherlands (Poel & Hyballa, 2011) have a support system for players too. This program has a continuous feedback system to resolve any defection. To having more efficiency, there is a high level of coordination between all levels of player development. Among organizations are involving in this program, this coordination is vital to ensure corrections and validation in implementation.

### **Importance and priority of each of the categories in the final model**

According to the findings, and coefficients of each category based on relations 1 and 2, respectively, DFBnet with 47 frequencies, centers of excellence 102, and TID/TP programs 48, criteria of player's successes in this program 75, DFB and DFL actions 191 and youth academies 181 have most importance ranks respectively. This means that the codes of these categories in all studied documents have suitable distributions.

In these documents, issues such as Double Pass and support systems, clubs, legal issues, have a less important rank. For example, the evaluator Double Pass Co. has obtained a lower rank. However, by studying the research literature, we can understand the importance of its role in talent programs in Germany and other countries, but it very interesting that there are not many repeated codes from it in the documents. Perhaps the reason for this apparent inconsistency is that the activity of this company has started many years ago and is not a very strong issue in German football now. So that it is not mentioned very frequently in documents.

But it must be noted that any country that would like to have a developed football, must necessarily have something similar or have close cooperation with this Co.

It can be concluded that the issues with high coefficients of importance for German football officials do not necessarily coincide with other important football issues in other countries, rather, it is related to the economic, cultural, social and political issues of societies. So, to use the German football development model, this issue should be considered.

**Table 4:** Importance and priority of the categories

Categories	Frequency	Unreliability $W_j$	Rating
<b>Role of the DFBnet</b>	7.3	47	1
<b>Role of the Centers of excellence</b>	5.4	102	2
<b>TID/TP programs</b>	4.8	48	3

## CONCLUSIONS

One of the best advantages of this study is that by using Meta-synthesis, comprehensive research and a complete review was conducted on the issue. Documents and the other past investigations had a specific view at this program and therefore presented only some aspects of this program. Hence, any comprehensive model of this program has not received. Also, for a better understanding of the Presentation model (see Figure 2), we preferred presenting the Model in three sections. Because many countries need to know the mystery of German's Success in football in recent years and also because of its complexity, we decided to show it. By displaying this complex model in three portions to show its beauty, harmony, cooperation and solidarity, divided duties, and above all, to show its success.

As we know, the DFB, after achieving the poor performance of the national team between the years of 1998-2000, formed a group to identify the reasons for these failures. Germans did a comparative study on a wide range of talent programs in the world, such as in the countries of France, Spain, and the Netherlands. The experiences gained from these studies h added to the elite sports program in German football. They concluded that there was a need to develop a comprehensive have DFB talent and elite development program. In this way, DFB provided a plan to do it. Subsequently, DFB and DFL created some hardware and software systems that have launched. The German government supported the DFB and DFL, to investing in the implementation of the program jointly.



In the same way, the government cooperated with the Ministry of Education to further cooperation between ESs and football schools, players in football schools, and at the same time studying in schools. The German government finances low-income clubs. As can be seen in the proposed model, there is two-way communication between government activities, DFB and DFL, Ministry of Education, and football clubs.

Double Pass, which has provided a quality management system, evaluates clubs, youth academies, centers of excellence, and elite football schools, and monitors their performance. Therefore, as shown in the model, there is a two-way connection between Double Pass, DFB and DFL, centers of excellence, elite football schools, youth academies, and clubs. Regarding the support systems of this program, we can point to the creation of 1000 soccer ground that created in small standards in 21 regions of the country. Because of these soccer ground, cooperation between education schools and clubs has increased. Such that a two-way partnership between education schools and clubs can conclude. Infrastructure development is one of the other support systems that has been instrumental in promoting and increasing collaboration between education schools and clubs.

On the other hand, these education schools are closely linking to football schools through the supervision of specialist coordinators. They are also linked to the government and the DFB and can use existing infrastructure. Along with these systems, DFBnet collaboration is one of the essential factors in recording all data about competitions, players, referees, coaches that help in evaluating the success of the project. Therefore, there is two-way communication between the DFBnet, DFB, and DFL activities, coordinators, regional associations, coaches, and clubs that can see in the model.

DFB, with the management of these soccer ground as one of its key actions, develops infrastructures, equipment, education schools, and uses DFBnet to manage this program in different areas. As another valuable effort, the DFB has created good cooperation with universities and research centers. Up to here, you can sense full-fledged and multi-faceted collaboration between DFB, Government, Double Pass, education schools, DFBnet, Universities, Coordinators, regional associations, Coaches, and Clubs, along with the development of Facilities and soccer ground, which is very serious and purposeful.

In the area of management and organization, they manage issues related to this program through Double Pass, DFBnet, regional associations, and coordinators. Also, DFB creates a synergy by using a specific number of coordinators with a strong background in football, between DFB regional bases, centers of excellence, elite football schools, regional associations, football schools, and education schools. Accordingly, these coordinators have overseen the activities of these centers. At the same time, the coaches' system also automatically cooperates with these centers and develops the activities and capacities of cooperation with this complex. By infrastructure development, increased coordination between organizations creates, and TID/TP programs begin. In this way, enthusiasts can enter DFB talent and elite development program. Another critical point of this program is that the exit indicators are voluntary.

Since the program involves three stages, when players enter the elite scene, they can, through the cooperation of the coordinators, enter Tournaments U17 and U19 or competitive levels of their age group. At this stage, if players pass from this level, they can enter the youth academies, and then, through the agencies, they can enter professional football and national teams. From the start of their entry, as long as they are present in the program, supportive systems are beside the players automatically.

In summary, DFB talent and elite development program is a successful example in world-wide programs that have not only taken into consideration in many countries, including China, South Korea, Japan, Australia, etc. but also other researchers, football officials, and governments are interested in it.

Therefore, it has suggested that football officials in other countries pay attention to three essential portions of this program. Considering the vital role of supportive and hard-supporting systems for setting up and launching the TID program, it can emphasize that these two are the essential requirements in this regard. In today's football, achievements are not just the detection of talented young players at an early age. But rather a long-term process that is a high-level management program, which, for full success, requires collaboration between many organizations such as Government, Football Federation, League organization, Clubs, Academies, Education, Football schools, Coaches,

and Players. In this program's Scheduling, talents must persuade pieces of training at his/ her age and according to their abilities. It should be much pleased that during the past twenty years, DFB has been doing very successfully in this regard so that each player trains in a specific stage that is appropriate for his/her abilities and needs. Then, if he/she qualifies, it can play in a professional team ultimately.

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