

Evolution of Language Productions and Action Rules Extraction: Case Study of an 8th Grade Class Girls during a Handball Cycle

Makram Zghibi¹, Chamseddine Gunoubi^{2,3}, Nabila Bennour⁴, Mohamed Ali Jbeli⁵, Faten Sahli⁵, Mohamed Jabri²

¹LASELDI, University of Franche-Comté, Besançon, France
²Higher Institute of Sports and Physical Education, Kef, Tunisia
³Research Laboratory "Sports Performance Optimization", National Center of Medicine and Science in Sports,
Tunis, Tunisia
⁴UMR EFTS, Mirail University of Toulouse II, Toulouse, France

⁵Higher Institute of Education and Training Contained, Tunis, Tunisia Email: makwiss@yahoo.fr

Received January 15th, 2013; revised February 18th, 2013; accepted March 2nd, 2013

The aim of this study is to describe the speech act of girls facing handball play situations and then see how to construct efficient action rules. The used method is choosing a descriptive, exploratory and heuristic analysis of the discursive practices of a group of girls (8 hours of effective lessons, 14 girls aged 14, T = 12 hours of actual practice). The study includes analyze of girl's speech during the debate of idea's situation. On the other hand, we aim the extraction of effective action rules. The quantitative study showed that speech productions increase notably more than the evolution of action rules formulation during the cycle. The qualitative analysis showed that the decisions made by the girls guide to re-question the relationship to knowledge in the educative cycles using collective sport games. Added to that, integrating moments where students can debate and share opinions about the game is didactically interesting in order to broaden and refine their repertoire of solutions to win.

Keywords: Debate of Ideas; Discourse Analysis; Action Rules; Handball

Introduction

Traditionally, the approach of teaching team sports is to make the players reproduce technical solutions. It imposes also certain tactical principles imitation before asking learners to move to the practical phase (Gréhaigne, Billiard, & Laroche, 1999: p. 28). However, numerous studies consider that team sports, like traditional games, tend to be the main tool in physical education and sport school lessons (Nachon, 2004).

The main hypothesis is to decrease student motivation in the classroom. In fact, why would a learner accept to follow a simple order of the teacher, to run, to jump, to throw, to dribble, to shoot, to concentrate, to be silent, or to answer?

Either the student obeys, or he rejects this "constraint" using certain behaviors such as: passivity, violence, withdrawal (self-isolation), and other "personal adjustments" of the initial didactic contract, learner's implicit submission or confrontation to the orders of the teacher, regardless to the nature of the reaction itself, seems discordant with a real attitude of actor/learner.

The lessons of basketball, handball or football are not only surpassing the problems of biomechanics coordination. They also raise questions about partners—opponent human relationships, concerning the principles, the successful collective action rules and the strategies related to intentionality (Nachon, 2004). The didactic researcher may question this process whether there is a link between team sports didactics and its low impact at school, the student participation and passivity toward "guideline methods" and the technical approach must be treated with a particular attention.

The context intervention, (the situation in which the speech is

delivered), affecting the logics so that the meaning produced by the end situation takes over on the starting one. This discrepancy between what is said and what is targeted was taken by the "pragmatics" as an object of study. This linguistic discipline is interested in language elements that their meaning cannot be understood only by knowing the global context. To better structure the study, Austin (1970) distinguishes, at the eighth of meetings entitled "Quand dire c'est faire", (saying is doing), three acts of speech.

The "locutionary act" (act of saying something);

The "illocutionary act" (an executed act by saying something);

The "perlocutionary act" (far to express a simple act).

In this study we opt for an illustrative analysis based on examples and a case study (7 girls team), we focus on the responses content made by students as well as discursive categories that appear through their language interactions.

Literature Review

Nowadays, the researches that give attention to constructive role of social interactions are studying whether the "asymmetric interactions guidance" or the "symmetric interactions of joint resolution".

The first pole is specifically looking in the different modes of supporting or tutoring. Gilly defines these guidance interactions as "the interactions in which a naive subject is assisted by an expert subject (adult or child more precocious than the naive) in the learning of knowledge or know-how skills" (Gilly, 1988: p. 136). To refer to anyone who has a better understanding or a

higher ability level than the learner. This orientation is at the origin of educational practices prioritizing all forms of regulation accomplished by a more qualified individual thus, able to provide a support to the learner.

The second pole focuses on the interactions of status and roles symmetry between peers. The experimental currents that are interested in this kind of interactions have clearly demonstrated that cognitive advantage may appear even without the intervention of the learner monitors or his peers. However, we should take into consideration the differences in cognitive abilities of learners. So we find ourselves dealing with the socioconstructivism approach (Perret-Clermont, 1979; Mugny & Doise, 1981).

This proposes a learning model of constructivism/interaction based on the concept of "socio-cognitive conflict". This model which is anchored in constructivism puts the stress on the social interaction as an effective means to enhance knowledge and help in constructing human intelligence. The authors consider that the socio-cognitive conflict is the result of the confrontations between individuals, which is the source of all cognitive development. In the same context, Mugny (1985) affirms that the constructivism approach supports the idea that individual cognitive activities get their meaning in social interaction. The child is the co-actor of his intellectual development and he necessarily increases his cognitive tools level by level, by structural activity. However we should note that the child can't enhance his cognitive abilities in an isolated situation. According to Chabchoub (2001), the socio-constructivism is based on three key concepts developed by the protagonists of the Geneva school: interactionism, social mediation and socio-cognitive conflict. The social interaction is a central component of cognitive development; it is a "privileged" link for such learner intellectual development: "The work that we have presented is based on the assumption that social interaction is a privileged cognitive development area" (Doise, 1991: p. 58). The development of the research questions starts from a simple rule: it is not enough to teach children for the sake of simple learning but to teach them how to make them "tell" and "do".

The underlying paradigms of this observation question deeply the knowledge status, the teacher and the learner. The semio-constructivist paradigm considers the interpretive act of the student as a "nodal" characteristic of the knowledge foundation; this paradigm allows to analyze, to understand and even to build learning situations by setting the learner in full of the appropriation/knowledge construction process by and in the action. Under these didactic device conditions, he is able to assign meaning to what he lives, to what he feels, to what he understands and to what he learns (Mahut, 2003).

In the classical description of the phenomena over an EPS (physical and sports education) intervention, the classic pattern is inspired from the information theory (Shannon & Weaver, 1949; Sperber & Wilson, 1989) and takes into account a transmitter (the teacher); a receiver (the learner) and a sent message from one to the other (knowledge). The teacher's mission is giving instructions about the learning received and accomplished by the pupil. The problematic, is that the learner is still devoid of any opportunity to develop the self-instructions and to give an intervention's meaning to these activities without the teacher's guidance. In discursive pragmatics, every speech is an act is registered in a project and destined to produce some effects (Austin, 1962, 1970; Kerbrat-Orecchioni, 2001). We do not communicate just to communicate, but every act of lan-

guage is inscribed in a principle of pertinence (Grice, 1957) valuable for the speaker. Every act of language has a sense and a meaning in the context for its producer, as worthy of interest or as a subject for interpretation. So the same speech act built to be addressed to a receiver-learner is not interpreted in the same way by another learner-receptor: therefore, an interpretation in message context prevails. Taking into account the above considerations, we question the necessity of opting for a team sport to a semio-constructivist approach that allows learners to discuss among themselves to build specific self-instructions (action rules). The objective is to access to "the way (ways) in which the learner interprets the opposition game" (Nachon, 2004). The purpose is to identify and to follow the kinetics growth of girl's spoken interventions and action rules elaborated in a ludic context of a handball cycle at school.

Methodology

This work is registered in a semio-constructivist perspective that aims to study the verbal exchange of girls during a Handball cycle. The research protocol proposed in this study organize a learning Handball cycle, eight lessons of one-hour session of practice (eight observed and recorded hours of corporal and verbal practice) in an authentic environment of teaching. It is a partially negotiated arrangement with the teacher for the global section of the cycle's organization; the teacher is the main responsible for the learned contents. Didactic situation of "debate of ideas" is gradually and systematically implemented in order to familiarize the learner and starts to exchange actually. It is placed in after/before a game situation with confrontation of 2 teams of 7 players inside a handball field of 40 m length and 20 meters width.

The suggested educational situations are based on game acts in a handball court. The class is divided in equitable groups; the girls play 7 against 7, then the team (1) verbalizes among themselves in the teacher presence, after that they return to the match. The team (2) takes 5 minutes break before returning to the game. Every lesson has two game situations of 10 minutes (two matches) under the teacher control, separated by a verbalization sequence of 5 minutes for team (1) assured by the same teacher. He asks three kinds of open questions: "What happened? Explain it? What to do?" and the teacher is neutrally stimulating girls. These questions are designed to engage players in the description, interpretation and decision making.

All game situations are digitally video filmed. All verbalization sequences "girl's verbatim" are recorded by a video camera to identify the interlocutors and then it will be transcribed then translated to English to be clearly analyzed. In other words speech analysis is the study of language interaction phenomena in a situated context, involving projects that influence actors who are in their turn co-constructing action knowledge between peers and debating their positions in the group.

In this study, which is inscribed in a descriptive and exploratory context, we judged it useful not to mention apriority hypothesis but we start up from the search results based on our direct observations. This methodological choice is firstly to escape the constraints imposed by the formulation of hypotheses and secondly, to assure that the empirical verification is touching the real verbalization of learners only (Zghibi, 2010).

The objective is not to verify the effects of an approach based on verbalization but it is a heuristic and exploratory study which aims, firstly to identify the speeches and to extract the

action rules developed by the girls during a handball cycle of eight 8 sessions, secondly to analyze the player's discursive language productions.

The girl's intercommunication is used as data for this actual study. Their gestures and facial expressions and the obscene and vulgar words and insults were not taken in consideration in the transcription process.

Results

Quantitative Study

Taken Speech

The following **Table 1** and the figure below show the number of verbal interventions of girls in each session. In fact, we note a significant increase in the number of contributions comparing to the first four sessions.

The speech evolution knew two main moments. The first moment lasts from the first (10) to the fourth session (12). Passing by eleven speeches during the second and third sessions respectively. As shown in **Table 1**, we note a slight growth at the fifth session (15). However, from the sixth session the frequency starts to become higher (18) and the number of rule-making actions respectively is overcoming 23 to 25 during the eighth session.

As shown in The **Figure 1** presenting the evolution of girl's taken speech, the girls, through the cycle, are gradually more able to identify (produce) action rules by themselves. However, they show a greater capacity to identify self-instructions during the last three sessions.

The **Table 2** presents the action rules developed by girls.

The improvement follows an ascending curve. In the first three sessions, we pass by 2, 3 to 4 action rules. A notable rising in the number of action rules with 7 on the fourth session to 8 during the sixth session. This augmentation is intensified from the seventh session (14 action rules) to attain its peak during the eighth session (17). The evolution of rulemaking action during cycle is displayed in **Figure 2** which shown that despite the two curves follow an ascending movement, the evolution

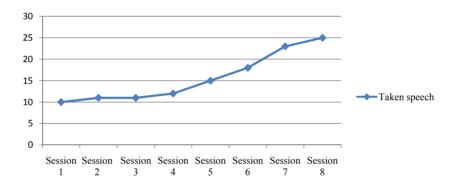


Figure 1. Evolution of girl's taken speech.

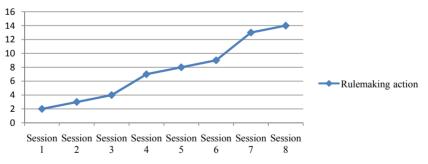


Figure 2. Evolution of rulemaking action during cycle.

Table 1. The taken speech of girls.

Sessions	Session 1	Session 2	Session 3	Session 4	Session 5	Session 6	Session 7	Session 8	Result
Taken speech	10	11	11	12	15	18	23	25	151

Table 2. Action rules developed by girls.

Sessions	Session 1	Session 2	Session 3	Session 4	Session 5	Session 6	Session 7	Session 8	Result
Rulemaking action	2	3	4	7	8	9	13	14	59



of words is more significant than the evolution of elaboration of rule-making actions for p < 0.05.

Qualitative Study

In this section we will center our research on the girls expressed views during the transcribed verbalization sequences. We will opt for a speech analysis. The objective of this analysis is to understand how, during these debates, the girls create meaning from game situations they have just lived (Charaudeau & Maingueneau, 2002). Moreover, the aim of this work is not to describe and analyze the discussion in itself, but to understand and improve the teaching/learning process by a posture change.

Meeting No. 1

- Aya: "We must continue playing together."
 - o Illocutionary act: assertion
 - o Perlocutionary act: declaration
- Nabila: "The solution... the solution is to attack with both wings."
 - o Illocutionary act: assertion
 - o Perlocutionary act: declaration

In this brief discussion, we note that Aya produces an injunctive speech engaging the whole group. Nabila does not agree with Aya, because she directs the exchange to another solution, she takes the assertive form. As a result, her speech is not more than a proposal. She does not force anyone. She would have used the same speech form of her friend. At this time, her statement would cancel the first and it takes over on it.

• Meeting No. 2

- Mounira: "We will try to take the lead and pull away."
 - o Illocutionary act: assertion
 - $\circ \ Perlocutionary \ act: \ order$
- **Fawzia:** "But you're supposed to be a defender with us, aren't you or what?"
 - o Illocutionary act: interrogation
 - o Perlocutionary act: criticism

"Try to go and catch the ball."

- o Illocutionary act: injunction
- o Perlocutionary act: order

"This is not normal; you're stuck on the same side."

- o Illocutionary act: assertion
- o Perlocutionary act: criticism

Mounira imposes on her colleagues a game involving the whole group: so she appears as the group strategist. This criticism is complemented by an injunctive form carrying a reproach: *do not stay inert*. From this brief discussion, we deduce a tension between members of the same team.

• Meeting No. 3

- Yasmine: "We must shoot more."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

"We must have someone that provides defense and coverage for our camp."

- o Illocutionary act: injunction
- o Perlocutionary act: order

"To provide coverage for our backside."

- o Illocutionary act: injunction
- o Perlocutionary act: order

"We must score a maximum of goals so that we can play qui-

etly."

- o Illocutionary act: injunction
- o Perlocutionary act: order
- Fawzia: "Everyone must take part to conserve the ball."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

"If you do not try to catch the ball, you can never win."

- o Illocutionary act: assertion
- o Perlocutionary act: statement

"We must pass and move the ball as possible as we can."

- o Illocutionary act: injunction
- o Perlocutionary act: order

"It must be done continuously and not occasionally!"

- o Illocutionary act: injunction
- o Perlocutionary act: order

Yasmin and Fawzia have argued injunctive sentences, conveying orders of the game manner. In this sense, their speeches propose accomplished projects to lead the score; that is why they use injunctive forms: all team members follow the instructions

Meeting No. 4

- Salma: "We will try to no more shoot the ball randomly."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

"Try to avoid long passes."

- o Illocutionary act: injunction
- Perlocutionary act: order

"We will try to opt for short passes."

- o Illocutionary act: injunction
- o Perlocutionary act: order
- Chayma: "We will try to make counter attacks."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order
- Ines: "We must play tightly close because we are giving the opponents alot of spaces."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

"We must reduce the open spaces by marking man to man."

- o Illocutionary act: injunction
- o Perlocutionary act: order
- Hamida: "Do not let the opponents play freely."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order
- Ines: "We must be well-organized in defense so we avoid conceding goals."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- Chefia: "We must mark them closely so they can't find spaces easily or score at any time."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

Four persons take part in this discussion. Chayma's speech is injunctive proposing game perspectives. Ines's speech is better to improve the game tactics. She does not only propose injunctions for all the team members. Chayma and Ines complete each other by argumentative connectors. "Any verbal interaction... definite an argumentation and a co-action frame (...). The analysis of conversational speech will be aimed at updating the arguments involved in verbal interactions" (Moeschler, 1985: p.

14)

Ines resorts to justification to convince the team. Her discourse is indeed rich. Yet, Chayma's discourse is limited to reformulate an order without explanation. She remains less perfectible.

Meeting No. 5

- Noura: "We must concentrate more."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order
- Nawress: "We must shoot the ball on each possible occasion."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

"Do not miss any ball."

- o Illocutionary act: injunction
- o Perlocutionary act: order
- Noura: "Let us move the ball and play normally."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order
- Nabila: "We must be patient; we conserve the ball in front of their cage; until we have the opportunities to shoot. Our chance to mark will be better."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order

"You could pass me the ball because I am in a better position for shooting than you."

- o Illocutionary act: assertion
- o Perlocutionary act: statement

The game characters continue to produce ideas and guidance for making a tactic of game and remedying to lead in the score. Nabila's speech continues to be the richest: her injunctions are completed by explanatory argumentative structures. She uses argumentations to confirm the merits of her suggestions. The other girl's injunctions remained brief and short, without any explanation.

• Meeting No. 6

- Monia: "I am also the last defender and I am entirely responsible for defense. So, I have to anticipate and intercept the ball."
 - o Illocutionary act: assertion/injunction
 - o Perlocutionary act: declaration/order
- Ahlem: "We must reorganize ourselves."
 - \circ Illocutionary act: injunction
 - o Perlocutionary act: order
- Monia: "We must try our best to score the shots."

Illocutionary act: assertion

- o Perlocutionary act: statement
- Nawress: "We must use wide shoots and from all positions."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- Naima: "We must take advantage of these lost balls."
 - o Illocutionary act: assertion
 - o Perlocutionary act: statement
- Radhia: "Sir, we must continue to play together; this is our strength."
 - o Illocutionary act: assertion
 - o Perlocutionary act: statement
- Hanen: "From now, we must be organized to better confront them and disturb them."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order

"Believe me, we can easily surprise them."

- o Illocutionary act: assertion
- o Perlocutionary act: statement

Overall, all statements produced have a target which is to project game manner. The injunctive speech of girls is usually completed by argumentations. Girl's argument, not only give us reasons but also give us an idea about the anticipated consequences. Following these decisions, the argumentation supposes the existence of an intellectual contact.

Meeting No. 7

- Noura: "You can score without shooting. Certainly 'like that', you can place the ball."
 - o Illocutionary act: assertion
 - o Perlocutionary act: criticism
- Hanen: "Sir, we are not organized."
 - o Illocutionary act: assertion
 - o Perlocutionary act: criticism

"We must move more along the 6 m line."

- o Illocutionary act: injunction
- o Perlocutionary act: order
- **Radhia:** "We must shoot more than that."
 - o Illocutionary act: injunction
 - o Perlocutionary act: order
- Fawzia: "We must switch positions between us."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order

"We attack rather than defend."

- o Illocutionary act: injunction
- o Perlocutionary act: order
- Ines: "We must pass and move the ball, after that we shoot."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- Leila: "We must counter attack as soon as possible."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order

Two key moments characterize the verbal exchange: The blames/reproaches and the proposed perspectives for remediation. As a result, in a syntactical plan; two sentence types were revealed: the assertive and injunctive forms. Except Hanen's speech, all statements, whether assertive or conveying orders are brief and short; offering only solutions to restart the game. Hanen is not only content with reformulating a reproach, but she completes it by an injunctive structure as a solution. In fact, her speech is the most structured.

Meeting No. 8

- Nawress: "We must continue to play like that."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- Ahlem: "Demanding the balls is the main solution of this problem."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- Nawress: "We must stand out if we want to win."
 - $\circ\,$ Illocutionary act: assertion
 - o Perlocutionary act: order
- Monia: "We shouldn't concede goals naively."

"You have to ask for the ball in the free area."

- o Illocutionary acts: assertion
- o Perlocutionary act: order
- Nawress: "We must profit on all the opportunities."
 - Illocutionary act: assertion

- o Perlocutionary act: order
- Chayma: "We should avoid losing the ball stupidly."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- **Nabila:** "Sir, we must shoot."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order
- Chayma: "Do not shoot from far, we must come near the zone area to try."
 - o Illocutionary act: assertion
 - o Perlocutionary act: order

"We must move and pass the ball the maximum before making any decision."

- o Illocutionary act: assertion
- o Perlocutionary act: order

"We will attack by three players and we change roles each time."

- o Illocutionary act: assertion
- o Perlocutionary act: order

All statements, produced at the beginning or the end of the cycle, are assertive typed aiming order establishment. All instructions are to correct the failure. Most of the instructions are accompanied by a brief argumentation that explains the causes or the consequences of the realized act. Nabila produced a well-structured speech but she stills dominated by her classmates developing the same type of discourse. Chayma's interventions are the most consistent.

Discussion

In the last three sessions, the language production's approach seems to be the most sought via the ability to make more verbal interventions. The verbalization sequences helped learners to acquire the necessary tools for speech-making in an evolution-nary dynamic context. This demonstrates that girls begin interpreting the game better in order to resolve the encountered problems during the game. Players are fully rooted in the process of verbalization and decision-making.

Speeches of girls progress along way the cycle. During the last three sessions, the words of the players have apparent evolutions while it is not during the first sessions. We note that the evolution has always followed an upward movement along the cycle. The evolution is in favor of the verbalization process. The girls are willing to react verbally and to provide more answers for phenomena considered as contradictory, as the multideter-mined/multi-determinants or evolutionary (Zghibi, 2009).

The speech evolution during the cycle is associated with action rules which are elaborated in advance. These action rules have been developed following a change in the girl's social representations concerning the game. In fact, the new representations of the game helped to resolve problems collectively (Thabuy, 2007).

These results agree with the Vygotsky's work (1985). If the concept of "conceptualization" is viewed in the light of the Vygotskian's sense, this postulates that language, thoughts and motoring act reunite in a dialogical and interpretative space. Inside the collective action, everyone is in a strategic situation to achieve something clever for him as well as for the team. Everyone enacts his proper situation participating in enacting the collective action of the shared situation... etc. The collective competence is always a synergy to build and rebuild in every match... the enacting is somehow distributed. As a result, we

can have experiences only in a group situation and this orchestration can be learnt only during the "play" (Masciotra et al., 2008: p. 69, 2009).

The linguistic productions have the greatest effects at the end of the cycle by developing the capacity to make more decisions: the idea's debate permitted the girls to acquire the necessary tools for building the action rules in an evolutionary and dynamic context. As a result girls begin to better interpret the game, they resolve the problems of the matcheasier. Thus, the players are fully rooted in the reflective practice process.

The discussion time given to girls has permitted to them to have a feed back to:

- o take a step back after a played situation;
- o think about and in action;
- o identify the problems met during the game;
- build a collective action project.

The actions rules developed by girls are a way to increase the action. Cottinet and Harmand (2003: p. 38) consider that the "explicit function of verbalization is promoting self-awareness, memorizing or emerging acquired knowledge. The verbalization gives back the learner the power to analyze his practices and debate them. And this is a sign of an investable learner's autonomy in all sports and outside school field, provided if it's explicitly taught." so verbalization is the process of putting thoughts into words. Thus, the idea's debate sequence is also a manner of going through the language process as well as to understand partially, at least, the other representation processes (Chang, 2009).

The players are involved through verbalization sequences towards a form of awareness of the context in which they realize their motoring production. "This action rules awareness along with verbalization is the most appropriate method to give an answer to the teacher authorities who participate in the development of skills and knowledge of learners from specificities that characterize them." (Deriaz, Poussin, & Gréhaigne, 1998: p. 273). These interlocutions are more engaging girls in a regulation form via a reflexive return over action: if the learner questions himself about the meaning that he gave to actions, he can pass to explain the strategies to use or used.

Referring to the literature; Lindemann (2007), declared that the constructivist posture contains the following points:

- the learner is active;
- the knowledge construction is a process operated in the learner's active experience;
- the interpreting learner puts in relationship the action and action mode sense:
- the interpreting learner is linked to the interaction between the subject and the contextual situation;
- o through the action, body experience is priming;
- through the signs, learner expresses how he lives his experience:
- o the learner debates in an argumentative universe;
- o the learner can share different viewpoints;
- the learner can use reflection trying to understand the process of constructing of knowledge in action;
- Learner and teacher build together their experiences during the educational process.

The learning perspective of constructivist approach focuses on the process in which learners can build their knowledge and actions from their experiences. Bearing in mind that the efficient action rules are defined as conditions to be respected and factors taken into consideration so the game actions be effective.

These action rules are taken into a provisional mental representation constituting a functional game interpretation having as a goal to arrange and classify the confrontation rules. Moreover, these actions rules help to explain the game actions; also they are the main tactical knowledge support. So during the debates, girls try to think via and through action. Thanks to an intercommunication process; girls are able to co-construct meaningful rules for an efficient action of the handball play. This allows us to extract and analyze the girl's action game rules in handball from discursive data collected during the verbalization sequences. In fact, through the reduced game situations and verbalization sequences; girls were able to expand and to perfect their response ranges.

The reflection on action in the human movement concerns at the same time behaviors (objectively as observable), the motor behaviors as an intentional processes and decisional strategies. This reflection requires a multidisciplinary approach, from the action philosophy (hermeneutics and phenomenology, argumentative rhetoric) to knowledge (constructivist epistemology), to semiotics (discursive pragmatics, discourse analysis), to disciplinary didactics, to intervention's sciences (psycho-sociology, cogni-sciences, cognitive and ergonomics). In this study, girl's discursive interlocutions showed that the discourse affected motor skills, tactics knowledge, behavior and cooperative decision... etc.

Sometimes, girls accept their colleague's verbalization (discursive interlocution), and other times they question the decisions and speech made by others (idea's debate). Deriaz, Poussin and Gréhaigne (2009) opt for the debate of ideas concept. However, in the same team there can be a certain agreement and common interests. In this sense we cannot assume that learners defend divergent view, but defend the common dynamic points of view. In this agreement situation the term "common sense" is the more suitable than the "discursive conflict" term (Kerbrat-Orecchioni, 1998). Moreover, Kerbrat-Orecchionii proposes a redefinition of the debate concept. This is not a discussion because it generally involves a public, it acquires a media character. It is never a matter of EPS sessions because there is no public to convince, but everything is played between learners (Zghibi et al., 2009).

Conclusion

In experimental conditions we note that girls have showed discursive skills. The taken speeches of the players over the last three sessions are more important than the beginning of the cycle. The girl's speeches and the efficient action rules are progressing throughout the cycle. These self-instructions key touch motor skills, strategies and tactics of the game.

Our study starts always from a playing situation where girls are called to verbalize to build effective action rules overcoming the game obstacles. The use of handball in EPS is redefined as and in a link of co construction between the pupil and others.

Therefore, the learner is incorporated in a collective search for knowledge in relation to his peers. Then, he becomes a co-author of the game. This construction is done by appropriation/validation/discussion of significances brought into play (Zghibi et al., 2009). The significance of girl's productions concerning idea's debate and how to construct efficient action rules help teachers to be aware of pupil's active learning abilities. In fact, by this discourse, teachers can reflect on their teaching method and to review their intervention modalities

aiming to improve the teaching/learning process.

Thus, "the discourse analysis objective is not focused on the extraction of laws or general principles, but it targets the interpretative activity of children considering the context. The child produces speech acts in order to give effect to the game situation. Thanks to the participation of the discursive action, the interpretation related to the game action will be changed and enriched" (Chang, 2009: p. 238).

In the Tunisian cultural context, knowledge is sought along way cycles of collective games hence the necessity to integrate moments where learner can share about game. We should remark that in a study alike we should seize the order of verbal exchange taking into consideration the differences between the team members: reports and obtained effects: verbal material, non-verbal material (postures, gestures, laughter... etc.). This means studying local and global organization of conversations where the interlocutor is engaged in a primordial role as a "manager" and responsible for the conversation. This work has other shortcomings:

- The no identification of gender variable's effect (the study affected only girls);
- Failure to identify the effect of verbalization on learning parameters in Handball;
- Failure to take into account the action rules while the game is in action:
- Intuition left by the description, "it is not surprising that at this level, the cutting operation leaves much room for intuition and the results vary from a corpus analysis to another" (Kerbrat-Orecchioni, 1998; p. 220);
- The translation itself is a problem because it can cause a deviation of meaning.
- Moreover, the explanation of the true meaning of the phrase is only possible using the context of its enunciation and prosodic accompaniment.

This research is an attempt in which we wanted to extract and analyze the effective action rules developed by the girls. The questions that arise here are: is it not necessary to verify the implementation of student's action plans? Is it not necessary to suggest a test modeling levels of practice and age levels? Isn't it appropriate to take into account the variable regions (West/North/East/South...) and city/countryside effect? Many opportunities are open for further studies.

The effectiveness of teaching practice can be determined by dimensions other than those directly related to learning situations, that is to say that the design of learning tasks, especially the realization of collective tasks leads an overhaul which reconsiders the relationship to knowledge by learners who report changing place in the team following their operation identity, reconfiguring the report back to knowledge and collective action

This perspective questions the impact of cultural determinism in the regulation of mutual relations within a community of normalized practice.

REFERENCES

Austin, J. L. (1970). When saying is doing. Paris: Seuil.

Austin, J. L. (1962). *How to do things with words*. Oxford: University Press.

Chabchoub, A. (2001). *Introduction to disciplines' didactics*. Tunis: ISEFC.

Chang, C.-W. (2009). Language, thought and action: Semio-construc-

- tivist approach in basket-ball game learning among CM2 (5th grade) pupils. Doctorate Thesis, Besançon: University of Franche-Comté.
- Charaudeau, P., & Maingueneau, D. (2002). Dictionary of discourse analyzes. Paris: Seuil.
- Cottinet, C., & Harmand, M. (2003). Verbalize to learn, a main activity on PSE.
- Deriaz, D., Poussin, B., & Gréhaigne, J.-F. (1998). The debate of ideas. E.P.S. Journal, 273, 80-82.
- Doise, W., & Mugny, G. (1981). The social development of intelligence. Paris: Inter Edition.
- Doise, W. (1991). Social interactions and cognitive instruments' development among children. In H. Malewska, & P. Peyre. T. (Eds.), *Thesocialization* (pp. 21-48). Paris: PUF.
- Lindemann, H. (2007). Constructivism and Pedagogy. München: Ernst Reinhardt.
- Gilly, M. (1988). In A. N. Perret-Clermont, & M. Nicolet (Eds.), *Interact and know*. Cousset: Delval.
- Gréhaigne, J. F., Billard, M., & Laroche, J. Y. (1999). *Collective sports teaching at school*. Paris: Bruxelles.
- Grice, H. P. (1957). Meaning. Philosophical Review, 66, 377-388.
- Kerbrat-Orecchioni, C. (2008). Language acts within the discourse: Interactive approach and conversations' structure. Paris: Armand Colin.
- Kerbrat-Orecchioni, C. (2001). Language acts within the discourse. Paris: Nathan.
- Kerbrat-Orecchioni, C. (1998). Verbal interactions: Interactive approach and conversations' structure.. Paris: Armand Colin.

- Mahut, B. (2003). Semiotic approach of didactic interactions: Gesture and verb in a PSE situation. Thesis, Besançon: Université de Franche-Comté
- Masciotra et al. (2008). In C.-W. Chang (Ed.), Language, thought and action: Semio-constructivist approach in basket-ball game learning among CM2 (5th grade) pupils. Doctorate Thesis, Besançon: University of Franche-Comté.
- Mugny, H. (1985). Social psychology of cognitive development. Berne: Peter Lang.
- Nachon, M. (2004). Interaction on physical and sportive education: The case of Basketball. Semio-linguistics kills approachand knowledge construction. Besançon: University of Franche-Comté.
- Perret-Clermont, A. N, (1979). *Intelligence building in the socialinter-action*. Berne: Peter Lang.
- Shannon, C. E., & Weaver, W. (1949). Mathematical theory of communication. Urbana: Illinois University Press.
- Sperber, D., & Wilson, D. (1989). The relevance. Paris: Minuit.
- Thabuy, A. (2007). Training teachers to focus on the learner. *Bulletin Expliciter*, 72.
- Vygotsky, L. (1985). Thought andlanguage. Paris: Sociales.
- Zghibi, M. (2010). Linguistic interactions and learning on football. European University.
- Zghibi, M., Zerai, Z., & Rezig, M. (2009). Verbalization's direct effectson action's strategies and decision makingsamong pupils at a football cycle. *Journal of Research about the Intervention on Physical and Sportive Education*, 16, 118-140.