

## SOCIAL EDUCATIONAL SKILLS OF PARENTS OF CHILDREN WITH AUTISM: LITERATURE REVIEW

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### ABSTRACT

This is a literature review of articles about educational social skills of parents of children with Autism Spectrum Disorder (ASD). Objectives: to identify, select and describe articles that characterized parental Social Educational Skills (SES) and perform a correspondence analysis between the behaviors addressed in these studies and the Social Educational Skills System (SESS) by Del Prette and Del Prette. Data source: articles published in LILACS, Scielo, PubMed, ScienceDirect and PsycINFO, without period specification. Conclusions: There was a lack of studies in the Brazilian context. Nine English-language articles were found. All SESS skill classes were identified, with the most frequent classes Positively Monitor and Transmit or expose content about social skills. Correspondence analysis demonstrated the possibility of using the SESS in studies with parents of children with ASD, as well as the need for improvements, including behaviors evaluated and/or trained in this population.

**Keywords:** social educational skills, parents, Autism Spectrum Disorder

## Habilidades Sociais Educativas de Padres de Niños con Autismo: Revisión de Literatura

### RESUMEN

Se trata de una revisión de literatura de artículos sobre habilidades sociales educativas de padres de niños con Trastorno del Espectro Autista (TEA). Objetivos: identificar, seleccionar y describir artículos que caracterizaron Habilidades Sociales Educativas (HSE) parentales y realizar un análisis de correspondencia entre comportamientos abordados en esos estudios y el Sistema de Habilidades Sociales Educativas (SHSE) de Del Prette y Del Prette (2008). Fuente de datos: artículos publicados en el LILACS, Scielo, PubMed, ScienceDirect y PsycINFO, sin especificación de período. Conclusiones: Se verificó la ausencia de estudios en el contexto brasileño. Se encontraron nueve artículos en lengua inglesa. Todas las clases de habilidades del SHSE se identificaron, y más frecuentes las clases Monitorear Positivamente y Transmitir o exponer contenidos sobre habilidades sociales. El análisis de correspondencia demostró la posibilidad de uso del SHSE en estudios con padres de niños con TEA, así como la necesidad de perfeccionamientos, incluyendo comportamientos evaluados y/o entrenados en esa población.

**Palabras clave:** habilidades sociales educativas, padres, Trastorno del Espectro Autista

## Habilidades sociais educativas de pais de crianças com autismo: revisão de literatura

### RESUMO

Trata-se de uma revisão de literatura de artigos sobre habilidades sociais educativas de pais de crianças com Transtorno do Espectro Autista (TEA). Objetivos: identificar, selecionar e descrever artigos que caracterizaram Habilidades Sociais Educativas (HSE) parentais e realizar uma análise de correspondência entre os comportamentos abordados nesses estudos e o Sistema de Habilidades Sociais Educativas (SHSE) de Del Prette e Del Prette. Fonte de dados: artigos publicados no LILACS, Scielo, PubMed, ScienceDirect e PsycINFO, sem especificação de período. Conclusões: Verificou-se a ausência de estudos no contexto brasileiro. Nove artigos em língua inglesa foram encontrados. Todas as classes de habilidades do SHSE foram identificadas, tendo sido mais frequentes as classes Monitorar Positivamente e Transmitir ou expor conteúdos sobre habilidades sociais. A análise de correspondência demonstrou a possibilidade de uso do SHSE em estudos com pais de crianças com TEA, bem como a necessidade de aprimoramentos, incluindo comportamentos avaliados e/ou treinados nessa população.

**Palavras-chave:** habilidades sociais educativas, pais, Transtorno do Espectro Autista

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## INTRODUCTION

The family context is, for most children, the basis for the development of their social competence. The family tends to be the first institution from which individuals will learn their main behavior patterns, as well as cultural values, rules and social roles (Baptista, Cardoso, & Gomes, 2012). Parents' social educational skills (SES) are a behavioral repertoire intentionally used to promote children's learning and/or development, composed of educational strategies and practices that occur in the interaction between parents and children (Vieira-Santos, Del Prette, & Del Prette, 2018; Del Prette & Del Prette, 2008b).

Parents' and caregivers' SES have been associated with children's social skills in typical populations (Bolsoni-Silva & Borelli, 2012; Bolsoni-Silva et al., 2008; Bolsoni-Silva & Marturano, 2002; Brazil, 2014). Another three studies also found this pattern with samples of children with developmental delays (Fantinato & Cia, 2014), Attention Deficit Hyperactivity Disorder (ADHD) (Rocha, Del Prette, & Del Prette, 2013), and Hearing Impairment (HI) and Language Disorders (LD) (Bolsoni-Silva et al., 2010).

The identification of the SES of parents of children who are the target audience of Special Education (PAEE) can provide a reference for planning interventions, favoring the promotion of inclusion, in view of the relevance of parents on the socio-emotional development of their children, and of this on the academic performance (Del Prette & Del Prette, 2008b). Among the different groups of children with visual, hearing, intellectual disabilities, learning disabilities, ADHD, giftedness and behavior problems, the study by Freitas and Del Prette (2014) identified Autism Spectrum Disorder (ASD) as a predictor category of deficits in social skills, as well as ADHD, externalizing and mixed behavior problems. Indeed, ASD causes significant early damage and persistent deficits in social interaction and communication and behavioral changes (World Health Organization [WHO], 2018).

The impacts associated with ASD, regardless of the severity of the disorder and/or the occurrence of comorbidities, affect their global functioning in different contexts of their life, such as social, family and school (WHO, 2018). Teaching skills needed for social interaction can have a significant impact throughout the lives of people with ASD (Frankel et al. (2010). These people, especially children, constitute a priority group in the application of intervention programs in social skills, including teachers, parents and caregivers (Del Prette & Del Prette, 2008b). However, until 2015, no Brazilian study evaluated SES in parents of children with Autism Spectrum Disorder (ASD) and its relationship with their children's social skills (Vieira-Santos et al., 2018).

The Social Educational Skills System (SESS) was

characterized by Del Prette and Del Prette (2008a) for the operationalization of the SES, through empirical and theoretical bases. The System includes four broad response classes and 32 subclasses, described as observable behaviors presented by parents and educators in general in the educational context. Some Brazilian studies have already used this System or instruments based on it to access the SES repertoire of mothers of children with ADHD (Rocha et al., 2013), of mothers and fathers of preschool children (Brasil, 2014), mothers of children/adolescents with and without type 1 Diabetes Mellitus (Kirchner et al., 2017) and caregivers of institutionalized children (Guerra, 2017), demonstrating its applicability to access SES in different clinical and non-clinical contexts and groups. However, the conceptualization and categorization of SES made by Brazilian researchers Del Prette and Del Prette (2008a) is relatively recent, making it necessary to recognize expressions used in the literature that describe behaviors similar to those contained in the SESS to access these skills in international studies.

Thus, due to the demonstrated importance of the influence of SES of parents in general and in some groups of PAEE children on their children's social skills and the clinical specificity of ASD, it becomes relevant to review the literature in order to identify and describe recent national and international studies that characterized the SES of parents of children with ASD. This identification can be useful in the sense of verifying the SES of parents that are empirically related to the behavioral repertoire of children with autism. In addition, reviewing studies that investigated the SES of parents of children with ASD can contribute to the improvement of the SESS, being able to generate the refinement of the descriptions of the classes and subclasses of this System, as well as its complementation for use with this target audience.

### Goals

The present study aimed to: (1) identify the types of articles found that evaluated SES, or similar behaviors, in parents of children with ASD, analyzing bibliographic and methodological aspects and (2) carry out a survey of the most studied SES in the literature, through a correspondence analysis between behaviors evaluated in the studies and the SES proposed in the SESS.

## METHOD

### Data collection

Step 1 of data collection consisted of defining the databases to be used. To verify the existing literature on SES by parents of children with ASD, a search was carried out in the LILACS, Scielo, PubMed, ScienceDirect and PsycINFO indexes, without restriction of publication period.

Step 2 consisted of defining the descriptors and how to combine them in the search. Nine combinations

were made, all possible combinations, with the descriptors “autismo”, “habilidades sociais educativas”, “habilidades sociais”, “competência social”, “estilos parentais”, “práticas parentais” and “parentalidade” and the terms in English “autism”, “social educational skills”, “social skills”, “social competence”, “parental styles”, “parental practices” and “parenting”. The same procedure was used in searches with terms in English. In the ScienceDirect database, which generated results of more than a thousand publications for two of the combinations, an additional criterion was applied to exclude articles in English that did not contain the terms “autism” or “parent” in the title.

In step 3, screening, the following were excluded: (a) duplicate articles in the databases, (b) texts in other publication formats such as book chapters, conference abstracts or discussions, (c) articles that focused on other constructs that they were not related to social and/or educational skills (stress, quality of life, parental perception, among others) and (d) review, theoretical, pharmacological, genetic and instrument construction or validation articles.

In Step 4, the full reading of the selected articles was carried out, applying the inclusion criteria: (a) being predominantly quantitative studies, (b) presenting the characterization of some social and/or educational skill of parents of children with ASD and (c) articles about parent training, which had assessed the skills repertoire of parents prior to the proposed training.

In the last phase, Step 5, a complete re-reading of the articles was carried out, to exclude those that characterized other classes of parents’ social skills

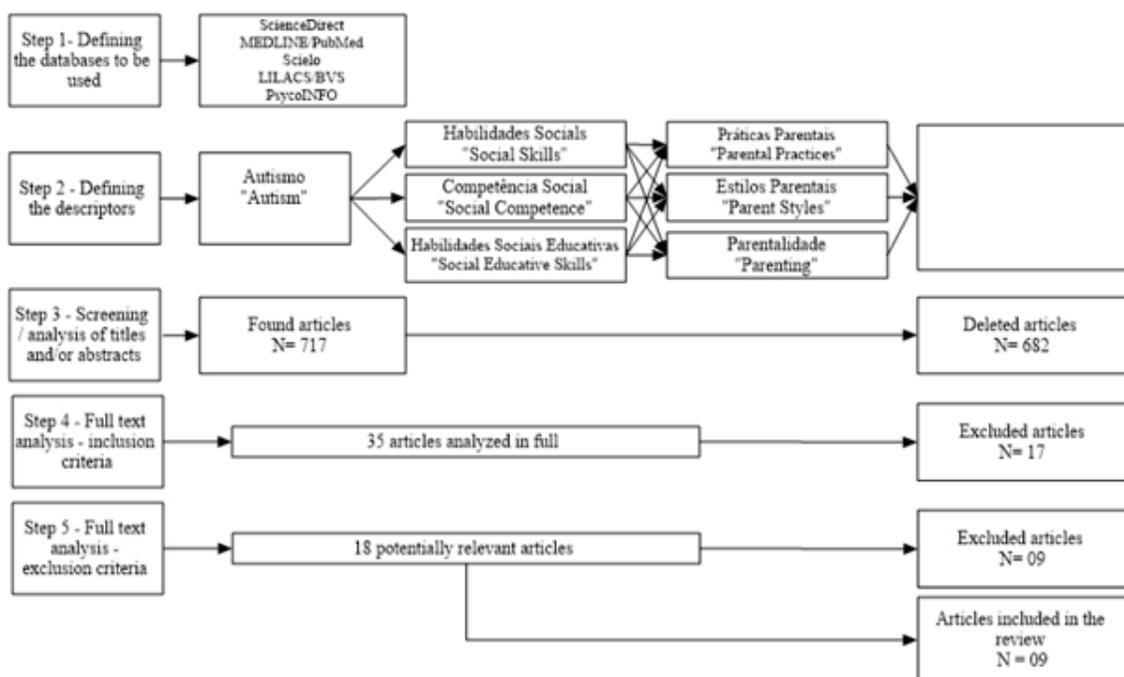
that could not be categorized as SES. This process was based on a detailed analysis of the parents’ assessment procedures and/or the intervention, if necessary with the checking of these procedures in other references.

### Data analysis

After excluding articles that did not meet the eligibility criteria, nine articles included were analyzed based on three general categories of analysis and the following subcategories: (1) bibliographic: name of authors, title, year of publication and country of origin; (2) methodological: study objective, designs, sample size and clinical characteristics of the sample, measurement instruments and results regarding parents’ educational social skills; and (3) correspondence analysis among parenting behaviors and SESS social educational skills.

In order to compare the parental behaviors identified that could be classified as SES, descriptions of these were verified, specifically addressed in the educational relationship between parents and children. These were selected, organized and compared to SESS classes and subclasses, strictly following their definitions. When the description found in the studies or complementary references remained broad, in terms of operationalization of behavior, all possibly corresponding subclasses of the SESS were included in the results. This process was performed by a pair of judges, who independently assessed each category of behavior described in the studies. At the end of the procedure, only the corresponding subclasses that were considered consensual were kept. Figure 1 presents the data collection flowchart and the analysis steps.

Figure 1. Flowchart of Selection Steps for Articles Included in the Review.



## RESULTS

No article published in Portuguese was found in the databases consulted. With the descriptors in English, 717 articles were found in Step 2. Only 35 were selected in Step 3. Applying the inclusion criteria, in Step 4, 17 articles were excluded. In Step 5, another nine articles were excluded from the review because they did not address any SES. At the end of the entire process, nine studies were included in this review.

### 1. Bibliographic characterization

Box 1 presents data referring to the authors and the respective years of publication of the articles. The numbers referring to the studies in Table 1 will be used in all topics of the Results to identify them.

Most of the studies (66%) were carried out in the United States, with the remaining studies originating in the United Kingdom (11%), the United Kingdom and Australia (11%) and the Netherlands (11%). No studies were found before 2007 and after 2015.

### 2. Methodological characterization

#### 2.2 Objectives

The review studies sought, even if including other objectives, to understand how parent-child interaction with ASD influenced or was influenced by several factors, such as training strategies and techniques, parenting style, parenting effectiveness, social support, attachment, social skills children's communicative, parental educational involvement.

#### 2.3 Outlines

Among the nine articles, six were evaluation studies and only three were intervention studies. According to Selltiz, Wrightsman and Cook (1976), a study (5) can be characterized as experimental, randomized, with a control group and follow-up; two studies were pre-experimental, one (3) pre- and post-test with one group, without follow-up, and the other (1) time series with follow-up (single-subject design, with multiple baselines). The remaining six studies were survey and/or correlational. Two of these (7, 9) with no static group comparison and three studies (2, 4, 6) with static group comparison. One of these (8) was panel (longitudinal).

#### 2.4 Sample

The sample size of the studies ranged from 3 to 151 subjects, and in five of them (1, 3, 4, 6, 9) the samples were smaller than 50. The age range of the children in the studies ranged from one to 14 years, and only one study addressed children over 6 years of age (8). Only one study (2) performed a comparison among groups with diagnoses other than ASD, with children with mental retardation and with language delay. The other two studies (4, 6) used comparisons with typically developing or non-ASD children.

The average age of caregivers was described in only two studies (3, 8), being 33.9 and 42 years, respectively. Most studies include only mothers as participants (1, 5, 6, 8, 9). Marital status was mentioned in only four studies, in which most participants were married or in a family with two parents (3, 4, 7, 8). Race/ethnicity was described in some studies, indicating that the expressive majority of the participants declared themselves to be white or Caucasian (2, 3, 4, 5, 8).

### 2.5 Measuring instruments

To assess parents' skills in interacting with their children, seven articles (1, 3, 4, 5, 6, 7, 9) used direct observation of behavior, using observation protocols (*Communication Play Protocol*, *Dyadic Communication Measure for Autism* (DCMA), *Developmental Play Assessment* (DPA), *Early Start Denver Model – (ESDM) Parent Fidelity Tool*, *Improving Parents as Communication Teachers – ImpACT Fidelity Rating Scale*, *Joy and Fun Assessment* (JAFA), *Structured Play Assessment*). The two remaining (2, 8) used non-standardized questionnaires for parents of children with ASD: *Child Rearing Practices Report* (CRPR) and *Family Involvement Questionnaire* (FIQ). There was no combination of these methods. Other instruments were used to measure parental characteristics, such as stress, social support, anxiety-related symptoms, parenting effectiveness, family cohesion, and amplified autism phenotype.

To assess autism in children, 77% of the articles (2, 4, 5, 6, 7, 8, 9) used one or both of the *Autism Diagnostic Interview* (ADI-R) and *Autism Diagnostic Observation Schedule* (ADOS) diagnostic instruments. The *Early Screening of Autistic Traits* (ESAT) appeared in two studies (2, 5) and the *Modified Checklist for Autism in Toddler* (M-CHAT) and *Childhood Autism Rating Scale* (CARS) were used in only one study (5 and 1), respectively). Other scales were used in the studies to track communication problems and social deficits, as well as scales of global aspects of development and maladaptive behavior.

### 2.6 Results of studies regarding the behaviors evaluated in parents

Studies designed to train parents or evaluating training outcomes (1, 3, 5, 9) have attested to the effectiveness of these programs, with greater use of skills learned by parents. Study 9, however, suggested that the degree of amplified autism phenotype in parents of children with ASD may be a moderator of these effects. Studies that aimed to assess parenting style in relation to educational strategies/practices (2, 4, 6) or communication style (7) pointed to a more directive and regulatory style of parents of children with ASD. Study 8 showed that maternal educational involvement in the context of children with ASD decreases over time.

**Box 1. Comparative Table Between Behaviors Found in Studies and Educational Social Skills.**

<b>Authors and year</b>	<b>Parenting behaviors studied</b>	<b>Corresponding classes (subclasses)</b>
1 - Ingersoll and Gergans (2007)	Imitating children's actions with toys (object imitation); gestures and body movements and vocalizations (gesture imitation); describe objects and actions that focus the child's attention with simple language (linguistic mapping); it leads her to perform, with physical help, verbal or gestural command, to praise him/her.	1 (3) 2 (10, 11, 13, 14) 4 (26)
2 - Rutgers et al. (2007) see: Dekovic et al. (1991)	Direct commands, directions; suggestions, positive encouragement, stimulation and encouragement of autonomy - stimulus to decision making and to know the consequences of one's own actions, freedom and expression of affection through physical contact, parental empathy.	2 (5, 7, 8, 9, 11, 13, 15) 3 (16, 17, 18, 19, 20) 4 (22, 23, 24, 25, 26, 27, 28, 31, 32)
3 - Ingersoll and Wainer (2011) (see Ingersoll & Dvortcsak, 2006)	Follow the child's lead, join him in the game, imitate him, use indirect stimulation of language (indirect stimulation) (talking to himself, talking in parallel, reformulating conversations); modeling age-appropriate play skills, arranging the home environment for successful interventions (staying visually out of reach (in sight-out of reach), inadequate portions, using a variety of prompts from the natural environment), give models, choices, require the child to respond (mand-model by questions), leave gaps for the child to complete in communication (cloze procedure).	1 (2, 3) 2 (6, 8, 10, 11, 14) 4 (22, 23, 25, 26, 27, 28)
4 - Meek, Robinson and Jahromi (2012) (see Kasari et al. (1988)	Following the child's lead to keep the child engaged in the interaction, engaging in the same activity, giving positive feedback, responding to the child's nonverbal communication attempts. Eliciting the child's attention to objects and events without using physical contact - showing objects, pointing to objects and events, modeling behaviors and actions with objects, provoking the child's eye contact. Controlling or managing the child's behavior, offering him/her objects; physically asking the child for action, physically helping him with the task, starting a new activity with him/her.	1 (3) 2 (10, 11, 13, 14) 4 (22, 23, 25, 26, 27, 29)
5 - Rogers et al. (2012)	Improve the child's attention and motivation; use of shared attention activities (sensory social routines), promote engagement and shared attention in the dyad, improve non-verbal communication, develop imitation skills, facilitate shared attention, use behavioral teaching (ABC's of learning): use shaping, strengthening, fading techniques (prompting, shaping, fading)	1(3) 2 (10, 11, 14) 4 (22, 25, 26, 27, 28, 29, 30)
6 - Freeman and Kasari (2013)	New play suggestion through: verbal or gestural model; declaration or indirect action, undemanding; imitation of a joke; demand a motor action, verbal or motor and verbal response through verbalization (direct imperative), gesture or physical help (doing with the child)	1(3) 2 (10, 13, 14)
7 - Hudry et al. (2013) see: Aldred et. al. (2011)	Parental synchrony: Communicative verbal acts that support the child's play or activity – comments, statements, or acknowledgment of the child's focus of attention. Parental asynchrony: Verbal acts used to direct or control the behavior of another – commands, directing or soliciting attention, questioning or denial.	2 (5, 6, 9, 10, 11, 13, 14) 3 (20, 21) 4 (22, 23, 24, 25, 26, 27, 28, 29, 30, 31)
8 - Benson (2015)	Promoting a learning environment for the child at home, providing a place at home with educational materials, spending time studying with the child, etc.	1 (2, 3) 2 (5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15) 4 (22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32)
9 - Parr et al. (2015) see McConachie et al. (2005)	Verbal responsiveness: using funny words, simplified language, musicality of speech, fun physical contact, smiles and laughter, speech imitations and expansions, speech turn routines. Structuring the environment: creating structured routines and using visual cues.	1 (2, 3) 2 (10, 11, 13, 14) 4 (22, 25, 26, 27, 28, 30)

### 3. Correspondence analysis between the SESS and parental behaviors

Box 1 describes the result of the correspondence analysis between the SESS classes and subclasses and the parental behaviors evaluated. The skills evaluated in the studies that were compared to the SESS were: behaviors that make up the authoritarian and authoritative styles (command, guidance, positive encouragement, expression of affection and parental empathy), reciprocity, verbal and non-verbal responsiveness, parental synchrony (communicative actions and shared attention), skills involved in playing (suggestion, imitation and demand for a playful action), maternal educational involvement (promotion of a learning environment at home) and the structuring of the environment, in order to favor communication (organization of routines and use of visual cues to stimulate the child's initiatives and responses), to reduce distractors, and to carry out parent training program activities.

All System classes were observed in the correspondence analysis. Class 2 (Transmitting or exposing social skills content) was identified in all studies. Classes 4 (Positively Monitor) and 1 (Establish potentially educational contexts) occurred in 8 studies and 7 studies, respectively. Class 3 (Setting limits and discipline) appeared in only 2 studies.

Table 1 presents the frequency of classes and subclasses present in the studies, in descending order. Regarding parental behaviors identified as SES, most belonged to Class 4 (Positively Monitoring) and Class 2 (Transmitting or exposing contents of social skills). Classes 1 (Establishing potentially educational contexts) and Class 3 (Establishing limits and discipline) were poorly represented. The predominant subclasses were: 10 - Present model, 25 - Present positive feedback, 14 - Present tips, 26 - Praise and 27 - Encourage. Two subclasses of the System were not observed in the correspondence analysis, 1 - Arrange physical environment) and 4 - Mediate interactions.

### DISCUSSION

This review verified the absence of published studies that address the SES of parents of children with ASD using the terminology defined by Del Prette and Del Prette (2008a). It was found that, despite this, several parental behaviors have been studied in English language articles, with other names, but which may correspond to some SES described in the SESS.

The studies proved to be quite heterogeneous in terms of objectives, methods and designs. A feature common to almost all studies was the predominant low age group. This is likely explained by the proven effectiveness of early interventions in autism (Rogers et al., 2012) and/or the negative reflections of social

deficits on peer relations and the academic performance of these children (Meek, Robinson, & Jahromi 2012).

From the results of the correspondence between the SESS and parental behaviors, it was observed that the behavioral classes most focused on have been those whose function is to monitor and positively reinforce the child's performance and contribute to the teaching of social skills content. Indeed, a systematic literature review of education and/or training programs for parents of individuals with ASD pointed to socialization, communication and play skills as the focus of these interventions (Dawson-Squibb, Davids, Harrison, Molony, & de Vries, 2020). This emphasis also reinforces the findings of Rocha et al. (2013), who demonstrated significant gains in children's skills with parent training in this SES class.

Verbal and non-verbal parental behaviors, such as offering role models (considered here also as the parents' imitation of the child's behavior in the interaction) and presenting performance cues were the most frequently evaluated. The relevance of these parenting behaviors has been demonstrated in studies, as well as a greater difficulty for parents of children with ASD in these skills (Meek et al., 2012; Freeman & Kasari, 2013; Hudry et al., 2013).

Other fundamental behaviors for teaching of social skills that appeared more consistently in the studies were those of presenting positive feedback, praising and encouraging. Characterized as contingencies of positive reinforcement, these behaviors contribute to the effective and more lasting learning of desirable social performances in children (Bolsoni-Silva & Marturano, 2002). In addition, according to the authors, these SES favor the strengthening of affective bonds between parents and children, since the parents' attention is directed towards the child's appropriate behaviors, providing the recognition of their potential. In fact, increased motivation and social initiative, as well as positive and differentiated reinforcement schedules of socially appropriate responses and parental involvement in this training, among other characteristics, are the strategies considered promising in interventions with children with ASD (White, Keonig, & Scahill, 2007).

Only two studies reviewed addressed parents' abilities to set boundaries and rules for their children, as defined in the SESS. This is probably due to both the age group of the children and the definitions of the subclasses, which involve a type of teaching that is almost exclusively verbal. The study by Kirchner et al. (2017), for example, identified that this repertoire tends to be less frequent in mothers of older children. In addition, children with ASD often have language delay and/or communication deficits (Hudry et al., 2013), which can make it difficult to learn behaviors through verbal descriptions. It is important to emphasize,

**Table 1.** Absolute (F) and Relative (%) Frequency of SES Classes and Subclasses Found in the Revised Studies.

<b>Classes and Subclasses of Educational Social Skills</b>	<b>F(%)</b>
<b>Class 1 - Establish potentially educational contexts</b>	19 (9,31)
3 - Change distance/proximity	15 (7,35)
2 - Organize materials	4 (1,96)
1 - Arrange physical environment	0 (0,00)
4 - Mediate interactions	0(0,00)
<b>Class 2 – Send or expose social skills content</b>	74 (36,27)
10 - Present model	17 (8,33)
14 - Present tips	15 (7,35)
11 - Summarize sent behaviors	11 (5,39)
13 - Present instructions	9 (4,41)
6 - Paraphrase	4 (1,96)
9 - Present information	4 (1,96)
5 - Asking probing or challenging questions	3 (1,47)
7 - Present objectives	3 (1,47)
8 - Establishing relations among behavior, antecedent and consequence	3 (1,47)
15 - Use ongoing activity or verbalization to introduce a topic	3 (1,47)
12 - Explore recreational-educational resources	2 (0,98)
<b>Class 3 - Establishing limits and discipline</b>	8 (3,92)
16 - Describe/analyze desirable behaviors	2 (0,98)
20 - Ask for behavior change	2 (0,98)
17 - Describe/analyze undesirable behaviors	1 (0,49)
18 - Negotiate rules	1 (0,49)
19 - Draw attention to pre-established standards	1 (0,49)
21 - Interrupt behavior	1 (0,49)
<b>Class 4 - Positively Monitor</b>	103 (50,49)
25 - Present positive feedback	16 (7,84)
26 - Praise	15 (7,35)
27 - Encourage	15 (7,35)
28 - Show empathy	14 (6,86)
22 - Express attention to the report	13 (6,37)
24 - Express agreement	8 (3,92)
30 - Establish activity sequence (Premack)	7 (3,43)
23 - Request information	6 (2,94)
29 - Remove aversive event	4 (1,96)
31 - Expressing disagreement/disapproval	3 (1,47)
32 - Promoting self-assessment	2 (0,98)

however, that this class of behavior is the most valued by educational agents (Del Prette & Del Prette, 2008b; Brasil, 2014). In this sense, its use by parents can contribute to a better adaptation of children with ASD at school, given that the absence of limits is associated with an increase in behavior problems and disruptive behaviors and a worsening in academic performance (Brasil, 2014).

On the other hand, it was shown that the SESS still does not include some behaviors within the educational context between parents and children with ASD described in the studies, such as the use of visual cues in the environment, structuring routines, showing attention to the child's behavior, among others. Hence the need to include skills in the System and improve the description of some subclasses, so that they include more specific skills in the context of the relationship

between parents-children with ASD.

### FINAL CONSIDERATIONS

The present review demonstrated the need to identify and evaluate the SES of parents of children with ASD used to promote the development of their children. These behaviors can provide a basis for understanding the educational relationship between parents and children with ASD and for therapeutic and educational interventions. Education is a complex task that is not restricted to the family, but is amplified in its joint action with the school and other educational agents (Del Prette & Del Prette, 2008b). Therefore, the recognition of the importance of the different classes of HSE for parents of children with ASD and their relationship with child development can help design effective and collaborative intervention programs between school and family, enhancing the learning of these children.

The need to establish operational behavioral descriptions was also evidenced, given the diversity of parental behaviors mentioned in the studies and the complexity of parenting functions. The operational description of the SES (Del Prette and Del Prette, 2008a) facilitates the comparison and verification of training or assessment results, as well as being useful in creating standardized instruments and replicating experimental studies. However, specifically considering the population of parents of children with ASD, improvements in the SESS are essential for its improvement.

As a limitation of this review, we can mention the use of approximate terms in the search in the indexers, which may compromise the inclusion of all relevant articles. Another limitation concerns the interpretative effort made to trace the correspondence between the behaviors studied, with little operational definitions, and the educational social skills of the SESS. Future studies could characterize the SES of parents of children with ASD in the Brazilian context. It is also suggested the review of instruments and observational protocols used with parents of children with ASD, with identification and comparison of parental behaviors usually evaluated in this population. In addition, it is considered that the SESS improvements pointed out in this study will be carried out in the future in order to make it a reference for the development of specific instruments for this population.

### REFERENCES

Baptista, M. N.; Cardoso, H. F.; Gomes, J. O. (2012). Intergeracionalidade Familiar. In: Baptista, M. N.; Maycoln L. M. T. (Eds.), *Psicologia de Família: Teoria, Avaliação e Intervenções*, 16-26. Porto Alegre: Artmed.

Benson, P. R. (2015). Longitudinal effects of educational involvement on parent and family functioning among mothers of children with ASD. *Research in Autism Spectrum Disorders*, 11, 42-55. doi.

org/10.1016/j.rasd.2014.11.011

Bolsoni-Silva, A. T.; Borelli, L. M. (2012). Treinamento de habilidades sociais educativas parentais: comparação de procedimentos a partir do tempo de intervenção. *Estudos e Pesquisas em Psicologia*, 12(1), 36-58.

Bolsoni-Silva, A. T.; Marturano, E. M. (2002). Práticas educativas e problemas de comportamento: Uma análise à luz das habilidades sociais. *Estudos de Psicologia*, 7(2), 227-235.

Bolsoni-Silva, A. T.; Rodrigues, O. M. P. R.; Abramides, D. V. M.; Souza, L. S.; Loureiro, S. R. (2010). Práticas educativas parentais de crianças com deficiência auditiva e de linguagem. *Revista Brasileira de Educação Especial*, 16(2), 265-282. doi.org/10.1590/S1413-65382010000200008.

Bolsoni-Silva, A. T.; Salina-Brandão, A.; Rosin-Pinola, A. R.; Versuti-Stoque, F. M. (2008). Avaliação de um programa de intervenção de habilidades sociais educativas parentais: um estudo-piloto. *Psicologia: Ciência e Profissão*, 28(1), 18-33.

Brasil, S. E. R. (2014). *Habilidades sociais parentais e infantis, problemas de comportamento em pré-escolares: Avaliação de pais e professores*. (Dissertação de Mestrado). Universidade Federal de São Carlos, São Carlos-SP.

Dawson-Squibb, J. J., Davids, E. L., Harrison, A. J., Molony, M. A., & de Vries, P. J. (2020). Parent Education and Training for autism spectrum disorders: Scoping the evidence. *Autism*, 24(1), 7–25. doi.org/10.1177/1362361319841739

Del Prette, Z. A. P.; Del Prette, A. (2008a). Um sistema de categorias de habilidades sociais educativas. *Paidéia*, 18(41), 517-530.

Del Prette, A.; Del Prette, Z. A. P. (2008b). Pais e professores contribuindo para o processo de inclusão: Que habilidades sociais educativas devem apresentar? In E. G. Mendes; M. A. Almeida; M. C. P. I. Hayashi (Eds.), *Temas em Educação Especial: Conhecimentos para fundamentar a prática*, 239-256. Araraquara: Junqueira e Marin.

Dekovic, M.; Janssens, J. M.; Gerris, J. R. (1991). Factor structure and construct validity of the Block Child Rearing Practices Report (CRPR). *Psychological Assessment*, 3(2), 182–187.

Fantinato, A. C.; Cia, F. (2014). Habilidades sociais educativas paternas e comportamento infantil. *Psicologia Argumento*, 32(supl.1), 177-186. doi.org/10.7213/psicol.argum.32.S01.AO16.

Frankel, F.; Myatt, R.; Sugar, C.; Whitham, C.; Gorospe, C. M.; Laugeson, E. (2010). A randomized controlled study of parent-assisted children's friendship training with children having autism spectrum disorders. *Journal of Autism and Developmental Disorders*, 40(7), 827–842.

Freeman, S.; Kasari, C. (2013). Parent-child interactions in autism: Characteristics of play. *Autism*, 17(2), 147–161.

- Freitas, L. C.; Del Prette, Z. A. P. (2014). Categorias de necessidades educacionais especiais enquanto preditoras de déficits em habilidades sociais na infância. *Psicologia: Reflexão e Crítica*, 27(4), 658–669.
- Guerra, L. L. (2017). *Repertório social de crianças sob acolhimento institucional e habilidades sociais educativas de seus cuidadores*. (Dissertação de mestrado). Universidade Federal de São Carlos, São Carlos-SP. Recovered from: <https://repositorio.ufscar.br/handle/ufscar/10600>
- Hudry, K.; Aldred, C.; Wigham, S.; Green, J.; Leadbitter, K.; Temple, K.; Barlow, K.; McConachie, H.; the Pact Consortium (2013). Predictors of parent-child interaction style in dyads with autism. *Research in Developmental Disabilities*, 34(10), 3400–3410.
- Ingersoll, B.; Dvortcsak, A. (2006). Including parent training in the early childhood special education curriculum for children with autism spectrum disorders. *Journal of Positive Behavior Interventions*, 8(2), 79–87.
- Ingersoll, B.; Gergans, S. (2007). The effect of a parent-implemented imitation intervention on spontaneous imitation skills in young children with autism. *Research in Developmental Disabilities*, 28(2), 163–175.
- Ingersoll, B. R.; Wainer, A. L. (2011). Pilot study of a school-based parent training program for preschoolers with ASD. *Autism*, 17(4), 434–448.
- Kasari, C.; Sigman, M.; Mundy, P.; Yirmiya, N. (1988). Caregiver interactions with autistic children. *Journal of Abnormal Child Psychology*, 16(1), 45–56.
- Kirchner L.F.; Benitez P.; Tatmatsu D. I. B.; Ribeiro G. W.; Vargas V. M.; Del Prette Z. A. P. (2017). Habilidades sociais educativas em mães de crianças/adolescentes com diabetes mellitus tipo 1. *Revista de psicologia*, 8(2), 155-164. Recovered from <http://www.periodicos.ufc.br/psicologiaufc/article/view/11728>
- Meek, S. E.; Robinson, L. T.; Jahromi L. B. (2012). Parent-child predictors of social competence with peers in children with and without autism. *Research in Autism Spectrum Disorder*, 6, 815–23.
- McConachie, H.; Randle, V.; Hammal, D.; Le Couteur, A. (2005). A controlled trial of a training course for parents of children with suspected autism spectrum disorder. *The Journal of Pediatrics*, 147(3), 335–340.
- Parr J.R.; Gray L.; Wigham S.; McConachie H.; Le Couteur A. (2015). Measuring the relationship between the parental broader autism phenotype, parent-child interaction, and children's progress following parent mediated intervention. *Research in Autism Spectrum Disorders*, 20, 24–30. doi.org/10.1016/j.rasd.2015.07.006
- Rocha, M. M.; Del Prette, Z. A. P.; Del Prette, A. (2013). Avaliação de um programa de habilidades sociais educativas para mães de crianças com TDAH. *Acta Comportamental*, 21(3), 273-283.
- Rogers, S. J.; Estes, A.; Lord, C.; Vismara, L.; Winter, J.; Fitzpatrick, A.; Guo, M.; Dawson, G. (2012). Effects of a brief Early Start Denver Model (ESDM) - based parent intervention on toddlers at risk for autism spectrum disorders: a randomized controlled trial. *Journal of the American Academy Child and Adolescent Psychiatry*, 51, 1052–1065.
- Rutgers A. H.; van Ijzendoorn, M. H.; Bakermans-Kranenburg M. J.; Swinkels S. H.; van Daalen E.; Dietz C.; Naber F. B.; Buitelaar J. K.; van Engeland H. (2007). Autism, Attachment and Parenting: A Comparison of Children with Autism Spectrum Disorder, Mental Retardation, Language Disorder, and Non-clinical Children. *Journal Abnormal Child Psychology*, 35(5), 859–870.
- Selltiz, C.; Wrightsman, L. S.; Cook, S. W. (1987). *Métodos de pesquisa nas relações sociais*. São Paulo: Editora da Universidade de São Paulo.
- Vieira-Santos, J.; Del Prette; Z. A. P.; Del Prette, A. (2018). Habilidades sociais educativas: revisão sistemática da produção brasileira. *Avances en Psicología Latinoamericana*, 36(1), 45–63. doi.org/10.12804/revistas.urosario.edu.co/apl/a.5069
- White, S.; Keonig, K.; Scahill, L. (2007). Social skills development in children with autism spectrum disorders: a review of the intervention research. *Journal Autism Developmental Disorder*. 37, 1858–1868.
- World Health Organization. (2018). International statistical classification of diseases and related health problems. (11th ed.). Recovered from: <https://icd.who.int/>

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