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The choice of toys by early childhood children

Вибір іграшок дітьми раннього віку (ukr)

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Abstract

The article deals with the problem of choosing toys by children aged 0-48 months. It represents how children's situational involuntary interest in toys gradually transforms into cognitive interest. The latter determines the young children's choices in various spheres of their life and, in particular, in choosing among the most accessible and feasible items – toys. The children's cognitive interest in the choice of toys has been studied in the object and toy environment. A comparative analysis of children's choices among three types of the most common toys was carried out. It has been proved that figurativeinteractive toys are the most popular among young children, figurative toys are in the second place, and collapsible toys are in the third place. The functional features of toys that encourage children to choose them have been revealed: sound, mobility, colour brightness. The more such features a toy has, the more often children choose it, the longer and more meaningful they play with it. It has been found that young children choose toy according to their psycho-physical, sensory capabilities and skills to act with it.

Keywords: choice, early age children, figurative, interactive and collapsible toys, properties of a toy, toys.

Анотація

У статті висвітлена проблема вибору іграшок дітьми від 0 до 48 місяців. Репрезентовано як ситуативний мимовільний інтерес дітей до іграшок поступово трансформується пізнавальний. Останній визначає вибіркову діяльність дітей раннього віку у різних сферах життєдіяльності дитини і, зокрема, у виборі серед найбільш доступних і посильних їм предметів - іграшок. Пізнавальний інтерес дітей у виборі іграшок вивчався у предметноіграшковому середовищі. Здійснено порівняльний аналіз виборів дітей серед трьох видів найбільш розповсюджених іграшок. Доведено, що пріоритетними у дітей раннього віку виявилися образно-інтерактивні іграшки, на другому місці – образні, на третьому – збірно-розбірні. Виявлені функціональні ознаки іграшок, які спонукають дітей обирати їх: звучання, рухливість, яскравість кольорів тощо. Чим більше таких ознак властиві іграшці, тим частіше діти її обирають, тим довше і змістовніше граються з нею. Виявлено, що діти раннього віку добирають іграшки відповідно психо-фізичних, сенсорних можливостей та умінь діяти з нею.

Ключові слова: діти раннього віку, вибір, властивості іграшки, іграшки, образні, інтерактивні та збірно-розбірні іграшки.

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Introduction

A toy is one of the objects that attracts a newborn's attention from the first days of life. It accompanies the child from an early age throughout preschool childhood. That is why toys have been created by adults and children since prehistoric times and have changed and become diverse according to the national and civilizational development of mankind. Many researchers have studied various aspects of preschool children's development by means of certain types of toys: figurative, didactic, mobile, musical, etc. These aspects are less studied in regard to early age children.

At the present stage, there is still a lack of comparative studies on young children's choice of a certain type of toy among others and analysis of children's activities with them. Previous studies (Artemova, 2019; Artemova, 2021; Artemova, Borova & Marieieva, 2022) revealed a clearly expressed selective attitude of children from the first year of life to certain toys and leading actions and games with them. At the same time, all known recommendations in early childhood and preschool pedagogy on the selection of toys take into account their importance for certain aspects of children's development from the point of view of adults. There are no recommendations that would take into account the child's interests and his or her selective attitude to toys and play with them. That is why there was a need to find out the main priorities of toy selection by infants and toddlers.

The purpose of the study is to find out the priorities of young children's choice of toys. It involves the following tasks: 1) to study the young children's choice of toys of a certain type among others; 2) to study the features of toys that stimulate children's choice.

The results of the study will allow educators to select toys for children of different age categories of early childhood more skilfully, according to children's preferences and the developmental effect of toys.

Literature Review

The toy as an object that accompanies children's activities in the game, as well as its influence on children has been studied in different historical periods in various countries and in many aspects: collapsible toys in sensory education (Froebel, 2005; Montessori, 2014), history of toy (Arkin, 1935; Elkonin, 1999), ergonomics of toys for their perception and use by children (Radina &

Ezykeeva, 1968; Florina, 1973; Manchuk, 2018), role of toys in sensory development of young children (Kryvonis, Drobotiy & Achkasova, 2012), in the emergence and development of preschoolers' role-playing games (Havrysh & Shchehlova, 2004; Hladun, 2005; Artemova, 2021), folk toys in child's development (Bogoraz-Tan, 1934; Bogoraz-Tan, 1939; Fihol, 1956; Naiden, 1999). Much less attention was paid to toys regarding young children (Ministry of Education and Science of Ukraine, 2006). The mentioned research focused on a particular type of toys and children's play with them; the toy was considered from the psychological pedagogical position of an adult as an object intended for the implementation of certain cognitive and developmental tasks of teachers or parents towards children.

According to Topaloğlu & Aslan Gördesli (2012), the child's choice of toys for a play is important because they are a kind of bridge between the imaginary and real situation during the process of play. Scholars also indicate that the toy should meet both the child's age and safety requirements.

Dag N., Turkkan, Kacar, & Dag H. (2021) trace the influence of age-related characteristics on the content of children's play activities from birth to 18 years and identify priority games and toys that can be used in them. They also emphasise the role of paediatricians and family physicians as advisors to parents on the choice of toys for children in terms of their safety and impact on children's mental, social, emotional, mental and physical development.

Onur Sezer & Sadioglu (2012) consider that toys are closely related to a child's self-presentation, imagination, interests, developmental level, and understanding of gender. The researchers analyse the impact of toys on a child's physical, mental, social and speech development during early childhood. They emphasise that the primary factor in choosing a toy is the child's age. In particular, they believe that babies like colourful rattles that stimulate all their senses, and these toys play a big role in the development of their senses, which are yet to be formed. Toddlers prefer to play games where they assemble and disassemble towers or other structures from blocks of different shapes and sizes. Using their newly acquired wrist movement skills, children under 24 months prefer simple LEGO-sets that they can use with other toys to act out simple stories. Preschool children like different objects



that stimulate the development of their creativity. Based on this, scientists conclude that children choose toys that enhance their skills, which they are acquiring at their current age. That is, according to Onur Sezer & Sadioglu (2012), every child should play with toys that are appropriate for their development and needs.

A similar point of view is supported by Healey, Mendelsohn & COUNCIL ON EARLY CHILDHOOD (2019). According to them, the best toys are those that match children's developing skills and abilities and help them to form new skills. Some toys are able to "grow with the child" – can be used in different ways as the child develops – 18-month-old child may struggle to use the cubes functionally (e.g., by stacking them one on top of the other), while 24-36-month-old child may use them to participate in complex symbolic play (e.g., feeding a doll with a cube instead of a bottle) or to build a bridge, demonstrating the development of spatial perception.

Clarke (2022), based on the age characteristics of infants, toddlers, and pre-schoolers, recommends parents to have a separate set of toys for each year of a child's life that would stimulate their development.

Dauch, Imwalle, Ocasio, & Metz (2018), Koşkulu, Küntay, Liszkowski, & Uzundag, (2021), Sivaraman & Skoler, (2023), studying the problem of the number of toys that a young child needs, concluded that when children have fewer toys, it leads to better quality of play, enhances the development of creativity and promotes longer interaction with an adult involved in children's play. Scientists explain that babies and toddlers are more easily distracted when there are many toys in front of them. This leads to a shorter duration of play with each toy and a loss of opportunities for deeper learning of particular toy. A large number of toys also does not contribute to the duration of joint play between a child and an adult. In addition, researchers point out that open-ended toys, which allow children to play in several ways, may be the best option for toddlers.

The study by Todd, Barry, & Thommessen (2016) was devoted to the choice of toys by children aged 9-32 months of different genders. According to their results, both boys and girls showed a tendency to increase the dominant choice of stereotypical toys for boys. At the same time, the scholars emphasise that biological differences give boys the ability to determine how to act with a toy in a mental way, while girls

are more interested in looking at the face of a figurative toy and are better at developing fine motor skills and manipulating objects. In general, researchers have found that children choose toys according to their gender - boys are more likely to play with masculine toys, and girls are more likely to play with feminine toys. The study by Lam (2023) notes that the tendency to choose toys based on the child's gender begins to be clearly visible from the age of 36 months, even when playing with a new toy.

Taking into account the analysis of available research in psychological and pedagogical science, we consider it necessary to carry out research on the choice of toys (figurative, figurative-interactive, figurative-collapsible and collapsible) by young children.

Methodology

The study was based on a personality-oriented approach to the child, which covers identifying, studying, understanding the interests of a kid that determine his or her various choices, as well as on the principle of subject-subject interaction between an adult and a child, which involved taking into account and supporting the child's choice.

The following research methods were used: observation of children's behaviour to find out the interests and corresponding choices of young children in the toy environment; creation of situations for children to find their interests and make them choose a toy among toys of different recording of children's actions, statements, games, behaviour with chosen toys by means of photo, video, audio recording; surveying educators and children's parents in order to identify interests, choice, and use of toys by children.

The obtained data were subject to description, comparative analysis, generalisation, scientific interpretation, and evaluation.

The studying young children's interests and choices took place in the conditions of the subject-toy environment in families and preschool educational institutions in Ukraine and in Germany. During the research, 990 choices of toys by children were identified and analysed.

Results and Discussion

The scholars' principled position was formed under the influence of modern global trends in the humanistic approach to the child who grows



and develops in the conditions of democratisation of social and educational relations between the family and the preschool education institution (Melnyk, Vertuhina, Artemova, Avramenko, & Pavlushchenko, 2020). First of all, the toy was considered as an object chosen by children according to their own preferences and psycho-sensory capabilities. Also, the toy was studied as a means of indirectly encouraging the child to perform functional

actions with it and, therefore, as a stimulus for the development of meaningful games of young children (Artemova, 2019; Artemova, 2021; Artemova et al, 2022). This approach ensured the child's self-expression, self-realisation (Reipolska, 2020) in game actions, episodes of the game plot and self-expression in game roles.

The analysis and interpretation of the research results are presented in Table 1.

Table 1.Children's interest and choice of toys (number of choices)

Children's age	up to 12 months	12-24 months	24-36 months	36-48 months	Total
Figurative toys	66	96	90	48	300
Figurative- interactive toys	120	210	72	24	426
Figurative- collapsible toys	0	18	36	12	66
Collapsible toys	18	102	66	12	198
Total	204	426	264	96	990

Table 1 shows that children are interested in figurative toys even before the age of 12 months.

They are mostly attracted to soft animal toys. In the age 12-24 months, children's interest in toys and choice of them expands due to the increasing of their assortment. Along with toy images of various animals, children aged 12-24 months are interested in and choose dolls and toys to play with: children's kitchen, other household appliances, and medical instruments. Children know how to act with such objects because adults use them in activities with or in the presence of babies. As toddlers aged 24-36 months expand their understanding of the environment, they reproduce it in play with a wider range of toys: baby dolls, a doctor doll, cartoon characters, dinosaurs, and various utensils. Interest of children aged 36-48 months in figurative toys somewhat fades due to the satisfaction of the need for their active use in various games in previous years. For this reason, female children, closer to 48 months become more interested in and choose new toys, such as a Barbie doll and a dollhouse. Thus, the peak of interest in and choice of figurative toys is between 12 and 36 months. This trend has an explanation. According to previous research (Artemova, 2019), by the age of 12 months, plot play only begins in the form of individual imitative play actions. In fact, the plot of the game (a meaningful chain of play actions) emerges from 12 to 24 months. Therefore, children are interested in and need toy household appliances to reflect the adults' current actions. At the age of 24-36 months, toddlers already reproduce elements of play roles - acting as mum, dad, car

driver with the appropriate toys. They also often act like a doctor with some "medical instruments". Toys such as a doctor dolls (Aibolit, Dottie McStuffins, Peso Octonauts *cartoon*) are interesting to them as an image, but they do not help them to realise the role. Children manipulate such toys like directors, i.e., move them, speak for them, developing a directorial game. Role-playing and directing games reach their peak at the age of 36 months. But children who play roles themselves need toys or objects necessary for the characteristic actions of the image they like and reproduce. Therefore, the images of people and animals expressed in a toy are of less interest to them and are chosen less often than before, when children were not yet able to identify themselves with them in a game role.

Childrens' (0-24 months) interest in figurative-interactive toys and their choice grow twice as compared to interest in figurative toys. They are interested in toys that can act somewhat independently by being able to set in motion. Toddlers' (24-36 months) interest in figurative-interactive toys decreases slightly, and after 36 months, it halves. From the age of 12 months, children are interested in a more diverse set of toys, dividing their choice between figurative, interactive and collapsible toys. This is due to the sensory and motor development of children, in particular, small hand muscles and motor locomotion.

Some collapsible toys are designed in the form of certain images (stacking toy in the form of a duck, sorter in the form of a car). The choice of



these toys was recorded only in a few children after 12 months; interest of children aged 24-36 months in them grows twice, but it decreases after 48 months.

At the same time, children's interest in collapsible toys without a fixed image was quite significant. A selective attitude towards them was already noticed in children aged 0-12 months; at the age of 12-24 months, interest in such toys increased almost 6 times; however, it decreased by a third in children aged 24-36 months, and was clearly manifested only by 2 children at the age after 36 months. Children aged 36-48 months made structures from collapsible toys according to the situation dictated by the game; sometimes they guessed an image in the construction by association (for example, G. aged 38 months, showing a tower made of several parts, commented: "Ice cream! Ice cream!"). Children aged 24-36 months were not yet able to create an image based on a task, picture or adult model.

In general, summarizing the analysis of the data given in Table 1, we note the following. At the age up to 12 months, children show interest in different toys; it mainly concerns the choice of figurative toys. However, babies prefer figurative-interactive toys that attract them with sound, mobility, brightness, that is, not so much with their image, but with their interactive characteristics. Children aged 12 to 24 months are twice as likely to be interested in choosing different toys. However, even at this age, the predominant kids' choice is still figurative toys. Children choose figurative-interactive toys twice as often among them. At the age of 24-36 months, children's interest in figurative toys generally decreases, but they most often choose figurative-interactive toys. Thus, if we analyse the choice of different types of figurative toys by young children, the following priority is obvious: they most often choose figurative-interactive toys, then figurative, and, finally – collapsible.

As the data summarised in Table 1 shows, most of the toys chosen by infants among the figurative toys were figurative-interactive. This prompted us to find out what exactly attracts children of the first year of life to these toys. The analysis revealed the following interactive properties of such toys:

- 1) sound of toys: sound effects, the ability of rubber toys to squeak, bug to buzz, duck to quack, doll, telephone to talk;
- melodies, singing of musical toys musical carousel, toy piano, dog, bird, elephant,

- fawn, bunny that sing, musical cube with images of different animals on its sides, multi-functional music centre;
- attractive colours, their change, flickering, brightness, contrasts;
- movement of toys: cars, motorcycles, which drive, ball, that bounces, rolls; dog, cat, turtle, which walk, finger theatre with images of animals that are set in motion by fingers;
- pleasant tactile sensations: softness of the toy, it is pleasant to stroke, squeeze, press on
- size, weight: fits in the palm of the hand, comfortable, easy to use - hold, lift, shake, tap with a toy (teether to chew, massage the
- practicality of the toy in use, when a child with still imperfect sensory and motor capabilities can use it in the game.

Children are most interested in toys with a set of interactive features, for example, a beetle that sounds like different animals, speaks, changes colours, moves on the floor; a duck that quacks, tilts and raises its head, steps with its paws, flaps its wings, lays eggs; a finger theatre with images of animals that can be moved by bending and unbending fingers, imitating their sound; a bear that sings and speaks. Such toys encourage the child to imitate the sounds of conversations with them, singing, dancing.

We will demonstrate the interest of children of different genders in figurative toys: 0-12 months

Girls are interested in soft toys, for instance S. (from 3 months) chose fish; V., U., H., S., G. – various soft animal toys - dogs, cats, bears, penguin, and rubber dog.

Boys are also interested in soft toys: A., M., 3., D., T. (from 3-6 months), M. (from 8 months), A., O. chose dogs, cats, rabbits, chickens, horses, cows, goats, bull, birds, hares, bear, elephant, rhino, lion, hedgehog, fish, shark, etc.

12-24 months

Girls S., G. chose a Ukrainian girl-doll, that sings; E., V., V., V., V., V., O., M., S., M., V., V., O. (from 14-18 months) – pets (cat, dog, horse, pig), aquatic creatures (fish, whale, stingray, frog, crocodile); M., S., G. (12-18 months) – doctor's/nurse's instruments.



Boys D., A., A. chose toy animals (horses, goats, dogs, kittens, rooster, duck, bear cubs, monkey, mice, hares); D. – toy kitchen, soldiers.

24-36 months

Girls S., G. chose baby dolls, animals, food, dishes, household appliances, medical instruments; V. – kinder-surprise toys without small details, cartoon characters.

Boys: E. preferred baby dolls, dishes, dinosaurs; A. – soft, rubber, plastic animals (panda, squirrel, cow, horse).

36-48 months

Girls S., G. chose cartoon characters, baby dolls, soft toys (elephant, Peppa Pig, cat), toy kitchen, V. – Barbie dolls, dolls' house, M. – dinosaurs, V. – medical kit, toy hairdresser, toy kitchen.

Boys R., B. were interested in dinosaurs, cars, soldiers.

Here are examples of the revealed girls' and boys' interest in *figurative-interactive toys:*

0-12 months

Girls: V. chose a talking doll, a toy piano with programmed melodies and animal sounds; S., G., Al. (from 3-8 months) – rattles, musical toys; Mar., M., S., G. – glowing balls, cars that make sounds and glow; S. (from 3 months) – finger theatre with images of animals; S., G. – duck that quacks, walks, lays eggs, clockwork animals – cat, dog, turtle, etc.

Boys: E. chose robots; Z. – mobile, musical carousel; M., Mack, Mick, D. (from 3-7 months) – car; D. – bizi-cube; E. – tractor, excavator.

12-24 months

Girls preferred to play with different toys: V. chose interactive animals; S., G., Al. – doll strollers; V. – rolling toy Bunny; S., G., V., M. – balls, musical instruments, balloons; V., S., Zl., M., D., N., K., G, S., G. – trucks and cars with opening hood, doors, lifting body, tractor with trailer, garage.

Boys Ar., D., An., Ig., Myk., E., S. chose car, tractor, ball; M. – music house.

24-36 months

Girls S., M., S., G. – dress-up doll, baby doll, car, kettle from the toy kitchen that makes a sound when it boils.

Boys D., B., N., S., Myk. – different cars, tractor; B. – transformer.

36-48 months

Girls chose dress-up doll, baby doll, car, kettle from the toy kitchen that makes a sound when it boils, dancing cactus, interactive house.

Boys R., E., B. – ball that makes sounds, cars, transformers, robots, gun that shoots balls, military vehicles, helicopter.

Also, we found out the choice of *collapsible toys* by children of different genders:

Girls and boys at the age of 0-12 months chose stacking toys – stacking rings. puzzles, nesting boxes, stack up cup toys.

12-24 months

Girls A., Z. S., G. chose construction sets with large details; O. – LEGO-constructor set, S., G. – stacking blocks, geosorter

Boys D., S., M., E., E. played with cubes, construction set, puzzles, mosaic,

24-36 months

Girls U., S., G. preferred puzzles; V., S., G. – cubes, construction sets.

Boys: D. – stacking blocks, construction set; O. – LEGO construction set.

36-48 months

Girls used puzzles, mosaic, Lego constructor, prefabricated house.

Boys chose stacking blocks, construction set, transformer cars, cars that can be disassembled into parts.

The analysis of the results allows us to assert that infants mainly observe selectively the interactive features of figurative toys, study them tactilely and aurally. And only from the age of 11-12 months and later, they choose to imitate certain interactive actions of toys: they sing, dance, imitate sounds, and join in setting the toy in motion.





During the research, babies and toddlers chose figurative toys without interactive features twice as rarely as similar toys with interactive features. Children were interested in:

- attractive images of toys (penguin, Blue Tractor, Peppa Pig);
- similarity of toys to people and animals.

However, there were certain toys that caused children's disgust. For example, the unpleasant face of a teddy bear caused the girl O. (8 months) to dislike it and not choose it among other toys; girls S. and G. (after 7 months) always ignored the plastic toy giraffe and did not choose it, but their attitude to the giraffe was somewhat improved by the adult's kind actions with it (gentle stroking, intonations to it), pitiful "complaints" of the giraffe about loneliness, requests to children to take it to play with them. Under the emotional influence of the adult's kind attitude and the giraffe's "requests", the children temporarily took it into their games, but soon forgot about it.

Among the collapsible toys, the most interesting for babies aged 6-12 months were those to which they had free access and with which they could perform various actions - folding/unfolding, fastening/unfastening, etc. (puzzles, boxes, nesting cups, stacking rings, etc.).

The possibility of active play according to the design of the toy and the actions that the child can perform with it encourages babies to choose these toys. They are also happy with the achieved result (assembled picture, inserted cup, assembled tower of stacking blocks, etc.) and draw adults' attention to it, expect their praise.

Babies aged 12-24 months were more interested in figurative-interactive toys than infants and chose these toys twice as often as ordinary figurative or collapsible toys.

Among the features of figurative-interactive toys that interested children in the age of 12-24 months, we singled out the following:

- 1) sounds of animals, cars, tractors that children imitate while playing with them;
- musical accompaniment of a toy, which the child listens to and imitates, sings or dances
- colour and brightness of the toy. First, the colour of toy attracts the children's attention, and then its size, shape or pattern (police car, animals, dolls);

- 4) movement: cars, helicopters-rollers, doll strollers; ball that increases in size when moving or acting with it;
- number of different moving parts on the toy: doors that open, wheels that spin, button that starts the movement of the toy;
- multifunctionality of the toy transformer

It has been found that infants and toddlers primarily choose figurative-interactive toys based on identical interactive features and functions (different movement, sound, colour change, etc.).

According to the growing cognitive interests, sensory and motor capabilities of babies, the range of figurative-interactive toys they choose to play with changes and becomes more diverse. Thus, children turn from passive observers of the actions of toys into active users, taking into account their interactive properties.

It should be reminded that children aged 12-24 months chose figurative toys twice as rarely as figurative-interactive toys. Along with individual imitations of the sounds and movements of the toy, babies were interested in a wider range of functional play actions and their active reproduction in the game. Namely:

- 1) to use toy animals (domestic and wild) adequately;
- to imitate the sounds made by animals and their behaviour;
- to reproduce sounds, special signals and movements of different cars, robots, trolleys or doll strollers:
- to perform various actions with the doll's hair (wash, comb, dry with a hair dryer), treat dolls, animals with a medical instrument kit, put them to sleep, roll them in a trolley or a doll stroller; dress, undress, feed dolls or animals.

When choosing dolls to play with, children preferred baby-dolls or dolls depicting the images of their favourite cartoon characters.

Toddlers' independent playful imitative actions occurred with figurative toys; it was not observed among infants or toddlers of the same age with figurative-interactive toys. The mental, sensory, motor capabilities of children aged 12-24 months are significantly developed than those under 12 months, so they could realize their acquired abilities to act independently with the toy, activating its functional potential more widely and in their own way.



The collapsible toys satisfied the children's interest and encouraged them to choose with their multifunctional properties. They were more varied in their movement and more complex in their structure than the toys chosen by infants. The toddlers' ability to cope with the game task fuelled their desire to choose toys and intensified actions with them, particularly:

- to create constructions, assemble a sorter, select and put together puzzles with images of animals, vegetables, fruits;
- 2) to play with the constructed structures in a game with figurative toys (dolls, accessories, dishes, furniture, animals, cars).

Toddlers aged 12-24 months combined figurative toys with collapsible toys: dolls in a house, on a bench, in a bed, at a table; cars in a garage; pets on a fence, wild animals in a zoo. Such situational placement of toys, modelling real situations, actually initiated a pretend and role play.

Figurative-interactive toys interested children aged 24-36 months mainly because of their interactive characteristics (sounds produced by toys – singing, dancing, growling; bright colour of the toy, its size, shape, movements) that encouraged and allowed various actions with them:

- 1) to vocalize toy animals;
- 2) to imitate the sounds of different automobiles (cars and lorries, special autos);
- 3) to play with musical toys and instruments in order to produce sound;
- 4) to learn different colours and shapes;
- 5) to drive cars and lorries, special autos;
- 6) to examine and learn the sensory properties of the toy by touch, soft, smooth, fluffy etc.

Children in the age of 24-36 months chose figurative toys (dolls, babies, cartoon characters, animals, dishes, furniture, cars) in order to use them in directorial, pretend and role-play games. For example, girl K., having chosen a doll, dressed it, fed it, put it to sleep, treated it as her "child", built a doll house for it, cooked meals in the toy kitchen, washed its clothes, took it to kindergarten, playground, hospital in a toy car, etc. The boy Z. transported "wounded soldiers" in an ambulance, chased criminals in a police car, and delivered blocks for the construction of a toy garage in a truck. Among the toys most often chosen by children, a significant place was occupied by the characters of their favourite cartoons (Lol doll, Peppa Pig, Pinky Pie, Lady Bug, Spark and Blaze cars, Robocar Polly); at the same time, the plot of the cartoon could be reproduced in a game – directorial or role-playing.

We have noticed, that children of this age personify themselves in the corresponding play role, along with the logical combination of individual play actions in the elementary plot of the game, e.g., a girl-mother takes care of a baby doll. In a child's play, a toy is an object that is the focus of the role-player's actions. At the same time, the toy is able to activate the child's actions due to its functional capabilities. The more opportunities there are for functional actions with a toy, the more interesting it is in the game, the more often the child chooses it, the more diverse and active he/she is in his/her actions with it.

In games with collapsible toys, children aged 24-36 months were interested in:

- the process and result of assembling: sorter, Lego, puzzles, towers of stacking blocks;
- 2) the possibility of playing the created structures with the dolls, animals, cars, etc.;
- the possibility of using puzzles, dominoes, picture lotto, selecting paired pictures in a joint game with an adult, a peer or an older child;
- 4) the novelty of the toy.

When playing with these toys, children have a certain task, which they try to perform as best as possible: to pick and assemble the toy in the order programmed in it to achieve the final result – to create a picture, a slender tower, etc. Also, we have found out such tendency: children are particularly interested in various constructors that can be used to build something new, and the larger the structure the child builds, the more interest he/she has in this process. During the game, children follow the rules for acting with a particular toy. However, the children's impulsivity and unrestrained activity in this age lead to frequent involuntary violations of the game rules. Playing with a partner complicates this situation.

The selectivity of children aged 36-48 months showed a more established interest in certain toys.

Children liked the following characteristics of figurative-interactive toys:

- sounds made by toy animals and musical toys: dog that sings, car that plays a melody, emits a special signal;
- 2) brightness of the toy car that glows;





- 3) mobility of the toy;
- multifunctionality of the toy the ability to roll the car, launce/start it with the keys, open the door or the hood.

Interactive features were just as interesting to children of this age as toddlers, but much less so.

They were twice as interested in figurative toys. It is due to these toys activate the ideas of children of the 4th year about the adults' actions characteristic behaviour of animals, encouraging kids to reproduce them in roleplaying games:

- to take care of dolls, babies, animals;
- 2) to perform game actions with cartoon characters according to their plots;
- 3) to perform familiar roles: E., S., G. E. (42) months) played as a pilot, a policeman or a builder, S. (40 months), G. (45 months) played as a daughter or a mother, cartoon characters Elsa or Anna, tigers, Bagheera, horses and riders;
- to note the similarity of toys to real objects (clothes, dishes, furniture) and to use them appropriately in the game.

Children aged 36-48 months used figurative toys in the process of directorial games - they performed typical actions with the toy (like horses hop); in role-playing games – the toy sometimes was used by the child to perform a certain role (rider). Also, the toy activated and children to identify role-playing helped behaviour during certain actions (a girl in the role of Elsa made miracles with a magic wand); an attribute toy complemented the child's image in a certain role (Elsa's dress, braid, crown created her game image).

Collapsible toys interested children of this age with their opportunities to create various games (didactic) structures, play predetermined tasks and rules. Namely:

- children made houses for dolls from coloured cubes without fasteners;
- they made pictures with different plots from puzzles, selected lotto, domino pictures, constructed buildings, cars from constructors (E. most often chose a LEGOconstructor, S., G. – dominoes "Vegetables, fruits", "Water world", "Wild animals", puzzles "Where is my mom?", "Who eats that?", "Who lives there?");
- in the process of construction, children made structures that differ in shape, colour, and functional purpose (one day G. built a train

of the chosen (from two) construction set, S. built an aeroplane; the next day, G. created blocks of the same colour - white, red, green, yellow – and was proud of his colour selection, showed them to adults, kept and displayed them).

It has been found out, that didactic games attract children through the process of choosing the right piece, comparing and combining it with a pair (puzzles) or a similar one (dominoes). Successful completion of this task makes children happy and encourages further actions, games with the same toy. Adherence to the rules for successful and honest performance of the game task forces children to be persistent, patient, and make efforts for success. The lack of such endurance provokes violation of the rules, despite the fact that they are understandable for children of this age. Failure upsets and disappoints children, and lack of restraint and violation of rules often causes children to leave the game and do not play with the toy in the future.

In addition, at this age, some children quickly lose interest in musical toys (toy piano, telephone that plays programmed melodies, music box) and toys that suggest the logic of actions with them (houses with bushings, stacking toy with rings that differ in the shape of the holes).

Thus, the child's choice of toys changes depending on their characteristics at different stages of early childhood.

The analysis of research in the field of pedagogy, history of pedagogy, psychology, paediatrics, and ethnology allows us to single out the following areas of study of children's toys: 1) history of the toy (Arkin, 1935; Elkonin, 1999); 2) features of a toy as an object for children's play (Havrysh & Shchehlova, 2004; Hladun, 2005; Onur Sezer & Sadioglu, 2012; Artemova, 2021); 3) role of toys in child development (Froebel, 2005; Montessori, 2014; Artemova, 2021); 4) requirements for the toy, in particular ergonomic ones (Radina & Ezykeeva, 1968; Florina, 1973; Manchuk, 2018; Dag et al., 2021); 5) folk toy in child development (Bogoraz-Tan, 1939; Fihol, 1956; Naiden, 1999); 6) choice of toys by children (Topaloğlu & Aslan Gördesli, 2012; Onur Sezer & Sadioglu, 2012; Healey et al. 2019; Clarke, 2022; Artemova et al., 2022); 7) influence of toys on the formation and development of play skills (Healey et al., 2019; Dauch et al., 2018; Koşkulu et al., 2021; Sivaraman, & Skoler, 2023); 8) toy selection based on the child's gender characteristics (Todd et al., 2016; Lam, 2023).

It has been found that although the concept of children's play has not changed over the past century, the modern toy is significantly different from the one of the previous centuries and it encourages the child to choose it. This trend is partly explained by the proliferation of electronic and sensory noise, which are characteristics of interactive toys that parents may perceive as necessary for a child's development. However, according to Healey A. et al., (2019), the main elements of such toys (e.g., lights and sounds coming from the robot) diminish the child's social participation, which could otherwise occur facial expressions, gestures and through vocalisation and is important for their social development. Instead. when developing recommendations for parents on toys for children, paediatricians (Healey et al., 2019) point out that toys should stimulate the child's imagination, encourage interaction with the toy and establish social contacts with other children or adults about the toy chosen for play.

The article has enriched the field of early childhood with scientific findings regarding the choice of different types of toys by children of different ages (0 to 12 months, 12 to 24 months, 24 to 36 months, 36 to 48 months). Also, the conducted research has contributed to distinguishing the properties of toys that influence a child's choice in a certain age and identifying among them the ones that are priority for him/her at each stage of early childhood.

The results of our research extend and clarify the information available in science on the dynamics of choices of figurative, figurative-interactive, figurative-collapsible and collapsible toys by children aged 0-48 months. The natural tendencies of children's choice of toys revealed in the study should be taken into account when parents and teachers choose an assortment of toys for children of different early ages. The facts and trends obtained and substantiated in this study are recommended to designers manufacturers of toys to produce them adequate to the age and functional capabilities of children of different early ages.

Conclusions

 The study has found that children's spontaneous interest in toys is transformed into cognitive interest, which encourages them to choose a particular toy among others. Functional actions with the chosen toy to a certain extent satisfy the child's interest and contribute to its further deepening and development. Non-functional

- actions with a toy occur when the child is not yet able to use the toy according to its intended play functions. In such cases, children adapt their actions with a toy to spontaneously arising short-lived interests, random figurative or spatial coincidences, and situational choices. Both functional and non-functional actions satisfy the child's cognitive interest and justify his/her choice of toy.
- The analysis of children's actions and games with toys has revealed that children aged 12-24 months made the largest number of choices out of the total number of all recorded choices. This can be explained by the increase in cognitive activity and the development of children's sensory and motor abilities in relation to objects and play activities with toys. In the second place according to this indicator are children aged 24-36 months. Along with the experience gained by children of the previous age group, they have significantly expanded possibilities of satisfying cognitive interests and choices in other non-game activities painting, working with a book, etc.

The third place in the ranking of choices is occupied by children under 12 months. Their interest and choice of toys increases especially in the period of 6-12 months, but their sensory and motor abilities to act with toys are still insufficient. The last place in the ranking in terms of the number of toy choices is occupied by children aged 36-48 months. Children of this age need fewer figurative toys in their games, as they are more interested in playing a role in a roleplaying game than in acting with a toy. Their interests are often focused on collapsible toys, but the analytical and cognitive capabilities of children of this age to act functionally with them are not yet sufficient. This determines the limited range of collapsible toys that children can use according to their functional characteristics.

3. The study has shown that children aged 0-48 months mostly chose figurative-interactive toys. Figurative toys were in the second place among their interests. Their choice of collapsible toys, including some with figurative features, was somewhat less frequent. The reasons for such children's uneven choice were identified. Figurative-interactive toys attracted them with interactive features: sound, movement, brightness, colour change, etc. Children successfully launched such functions of the toy from the age of 10-12 months and were satisfied with watching and listening to



- them. This corresponded to the age-related psycho-physical and sensory children's abilities. With the further development of mental processes, in particular imagination, children aged 12-48 months were more interested in the image of the toy, and its interactivity was a complement and an expression of the image. Therefore, toddlers and preschoolers were more likely to choose figurative toys and use them in games. The further psycho-physical development of children encouraged them to imagine themselves in a certain image and, accordingly, to be their own performer in a certain role in a role-playing game. The above analysis allowed us to identify the approximate age parameters of children's priority choices of toys and their use in object and play activities.
- 4. The revealed dynamics of children's choice of collapsible toys and games with them has demonstrated progressive changes from children's actions by trial and error at the age of up to 12 months to understanding of game tasks and game rules at the age of 12-36 months, and conscious compliance or ignoring them at the age of 24-48 months. In these games, it is important to have a partnership (interaction) between an adult and children as a preparation for joint games with peers.

In the perspective of further research, it is important to study the development of object and play activities of early age children in the conditions of satisfaction of their choice of toys in the subject-toy environment and subject-subject interaction with adults and peers.

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