

What kind of parental involvement in early childhood will have good effects on subsequent child development? To find the answer, Benesse Educational Research and Development Institute has been conducting a longitudinal study over a seven-year period of children's lives, from nursery school junior class to the 4th grade, under the theme of learning preparation early in life. Today, I would like to present some of the outcomes of this study.

The longitudinal study set up three axes (lifestyle, letters and numbers and thinking, and attitude for active learning) as being what infants should learn if they are to adapt themselves smoothly to study, and life at elementary school and afterward, to see how such abilities develop. The attitude for active learning is divided into five categories (curiosity, cooperativeness, perseverance, self-control, and self-assertion). The study results show that children who successfully acquire a good lifestyle during junior class age are likely to have a stronger attitude for active learning by middle class age, and such children are likely to have higher abilities in letters, numbers and thinking by senior class age (K3). Furthermore, children who have acquired a high level of three abilities by senior class age tend to show a stronger learning attitude (willing to learn) in first grade. It was found that establishing a proper lifestyle during early childhood and cultivating an attitude for active learning through play could develop the skills required for study at elementary school and afterward. In recent years, the number of mothers intent on giving their children a good education has been increasing. They are encouraged to keep this development sequence in mind, and have their children cultivate an attitude for active learning through play suitable for infants, not focusing only on education in letters, numbers and thinking early in life.

As for parental involvement, parents' attitudes, such as "encouraging a child to think" and "respecting a child's motivation" could cultivate an attitude for active learning. "Encouraging a child to think" includes parents becoming good listeners, accepting and guessing a child's thoughts and words, and effectively influencing them to bring out what they want to say. Parents' attitudes are important, with activities such as thinking together and talking with their children with the viewpoint of their children in mind, and a relationship in which parents can expand a child's words and create environments where a child can express his or her own opinions confidently.

The study of how a child's attitude for active learning can be cultivated through nursery school life showed that children tend to have a stronger attitude when they have many opportunities for "playing-hard experiences" and "collaborative activities." "Playing-hard experiences" include being creative in playing, producing without a teacher's help, and working on challenging activities. Children who have had rich experiences of playing in their own way, and proactively engaging in activities with various creative ideas added, tend to have a stronger attitude for active learning.

Previous studies show that the attitude for active learning affects the degree of well-being in life. And the results of our longitudinal study revealed that this attitude could affect learning attitudes after entering elementary school, as well as logic and language skills in the upper grade. The cultivation by parents and teachers of children's attitudes for active learning means a lot, in the sense that it could greatly affect children's growth into the future.

Longitudinal Study on Infant Development Process

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Today's Agenda

- 1) About Benesse Corporation and Benesse Educational Research and Development Institute
- 2) Longitudinal Study on Development Process
 1. Attitude of active learning
 2. Japan's Study of "Attitude of active learning" and infant development
 3. Relation with parental involvement
 4. Relation with ECEC
- 3) Borderless Research Network

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Educational Research

Children, parents, teachers and schools



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Declining Child Population

Infants' parents are in the generation of the declining birthrate

Number of births (actual figures)

(Persons)

Peak of the Baby Boomers
2,091,983人

40 years old

1970年
1,626,088

1970年
1,889,815

1980年
1,642,580

1990年
1,221,585

2012年
1,037,101人

2000年
1,190,547

Almost halved over a period of 20 years

Source: Cabinet Office "White Paper on Child and Childcare for 2012" (July 2012)

http://www8.cao.go.jp/shoushi/whitepaper/w-2012/24webhonpen/html/b1_s2-2-2.html

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Attitude of Active Learning = achieving goals, managing emotions, and working with others (“social and emotional skills” in OECD)

Cognitive skills

- Basic cognitive ability
- Pattern recognition
- Processing speed
- Memory
- Knowledge-acquired
- Access
- Extract
- Interpret
- Knowledge-extrapolated
- Reflect
- Reason
- Conceptualize

Social and emotional skills

- Achieving goals
- Perseverance
- Self-control
- Passion for goals
- Managing emotions
- Self-esteem
- Optimism
- Confidence
- Working with others
- Sociability
- Respect
- Caring

(OECD, 2015)

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Characteristic 2 – Cognitive skills and “attitude of active learning” affect each other during development

The diagram shows two parallel horizontal timelines. The top timeline consists of three green circles, each labeled 'Cognitive skills (t-1)', connected by a solid pink arrow pointing from left to right. The bottom timeline consists of three blue circles, each labeled 'Social and emotional skills (t-1)', also connected by a solid pink arrow pointing from left to right. Between these two timelines are two red rectangular boxes, each labeled 'Environments and contexts'. Dashed orange arrows point from each 'Environments and contexts' box to the corresponding pair of skill circles. Additionally, dashed orange arrows point from each 'Cognitive skills' circle to the 'Social and emotional skills' circle immediately following it, and vice versa, indicating reciprocal influence between the two skill sets over time.

Dynamic interactions between cognitive skills and social and emotional skills

Skills beget skills. The higher the levels of skills individuals have, the the higher their gain in skills. Social and emotional skill can aid cognitive skill development. A highly skilled child is more likely to select the right tools in order to advance his or her knowledge, or seek out further opportunities for growth.

(OECD, 2015)

Benesse divides an "attitude of active learning" into the following five categories

Three axes in preschool education = Learning required to adapt oneself to study and to life after elementary school

Attitude of active learning	Curiosity	5 items – e.g. can ask questions (why, how) to people around when one doesn't understand
	Cooperativeness	5 items – e.g. can cooperate with friends when playing
	Perseverance	4 items- e.g. can challenge things without giving up
	Self-control	6 items – e.g. can refrain from doing things that others do not want, even when it's intriguing
	Self-assertion	5 items – e.g. can tell one's feeling to another and listen to another
Letters, numbers, thinking	Letters	4 items – e.g. can read kana
	Numbers	3 items – e.g. can count, such as "one piece, one bottle"
	Languages	4 items – e.g. can make oneself understood by using one's own words in the correct order
	Ability to categorize	4 items – e.g. can sort things in order, by length, size or height, for comparison
Life-ops	7 items – e.g. can go to bed at a fixed time	

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Changes in Infants' Families in Japan

1. Broader age range of parents
 - Fathers of a child aged 6–17 months: aged 19–59 years
 - Mothers of a child aged 6–17 months: aged 18–47 years
2. About half of the respondents had contact with babies before the birth of their own child (among parents with infants aged 0–2 years: 51.1% for fathers and 45.1% for mothers)
3. Infants spend most of their time at home or at nursery school
 - i. Closer parent-child relationship, with fewer chances to play in the community
 - ii. Expanded role of the nursery school
 - iii. Decrease in parents' community interaction through children
4. Significant decrease in education costs over the past 20 years
5. Mothers' changing values on childcare

How can we create opportunities for infants to develop generous sociability through interaction with various people and create value through collaboration with others?

Characteristic 1 – Skills beget skills

Skill development over a lifetime

Large effects from babyhood

Social and emotional skills are developed over time, with the past learnings being a basis. Skill development is affected not only by genes and environments but also by inputs from families, schools, and communities. Parents shape many of the environmental factors that will influence children's development. The effects that culture, policies and institutions have on skill formation and across learning contexts should not be underestimated, either.

(OECD, 2015)

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The Course of Study for Kindergarten and Nursery Childcare Guidance, in force since April 2018, has three pillars describing qualities and abilities to develop

The diagram illustrates the three pillars of qualities and abilities to develop, structured as follows:

- Top Pillar (Draft):** Three pillars of qualities and abilities to develop (draft)
- Central Pillar:** How should one connect with society and the world, to live a better life?
 - Attitude of active learning, humanity, etc.
 - Cultivate "attitude of active learning and humanity" that enables one to use learnings for one's own life and for society
- Bottom Left Pillar:** What one understands and can do
 - Acquire **working and effective** knowledge and skill
 - Structured by viewing "solid academic ability" "healthy body" and "generous mind" as a whole
 - Knowledge and skill
- Bottom Right Pillar:** How one uses what one understands and can do
 - Develop abilities to think, make decisions, and express oneself to **respond to unfamiliar situations**
 - Abilities to think, make decisions, express oneself

Source: Central Council for Education "Summary of discussions for the next course of study," Materials for the Special Working Group, Course of Study Panel (Aug. 1, 2016)

http://www.mext.go.jp/press/kyouiku/kyouiku/05/area/_ref/kyouiku/2016/08/13/15948_1.pdf

The diagram illustrates the progression of learning attitudes across different grade levels, categorized into Junior class, Middle class, Senior class, 1st grade, and 2nd grade. The progression is shown through three main components: Letters, numbers, thinking; Attitude of active learning; and Lifestyle.

Junior class: Contains boxes for Letters, numbers, thinking; Attitude of active learning (labeled 1); and Lifestyle.

Middle class: Contains boxes for Letters, numbers, thinking; Attitude of active learning *cooperativeness (labeled 2); and Lifestyle.

Senior class: Contains boxes for Letters, numbers, thinking *languages (labeled 3); Attitude of active learning *Self-control *Persistence; and Lifestyle.

1st grade: Contains boxes for Learning attitude; Letters, numbers, thinking; Attitude of active learning; and Lifestyle.

2nd grade: Contains boxes for Learning attitude; Letters, numbers, thinking; Attitude of active learning; and Lifestyle.

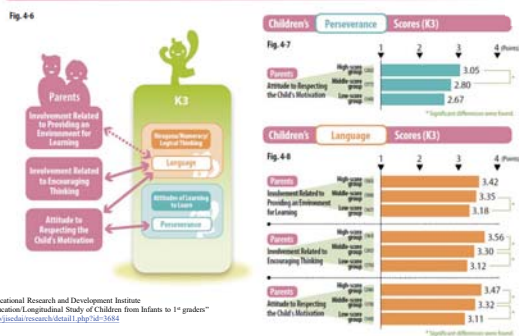
Arrows indicate the flow of progression from Junior class to Middle class, Middle class to Senior class, Senior class to 1st grade, and 1st grade to 2nd grade. A red dashed line highlights the progression from Junior class to Middle class to Senior class, with red arrows pointing to the specific components mentioned in the text.

Text description: Lifestyle at junior class age provides a basis for cultivation of an attitude of active learning. A cultivated attitude of active learning leads to development in letters, numbers, and thinking. An increased attitude of active learning, with knowledge in letters, numbers and thinking, provides a basis for learning attitudes of 1st graders.

3. Relation with Parental Involvement

“Languages” and “perseverance” of K3 children are supported by parents’ attitudes to “encourage a child to think” and “respect a child’s motivation”

Children's Growth and Parent Involvement in K3 Period



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3. Relation with Parental Involvement

The meaning of “respecting a child’s motivation” and “encouraging a child to think”

Respecting a child’s motivation

- Accept a child’s feeling
- Respect and support what a child wants to do
- Prioritize a child’s opinions and requests
- Listen to a child when scolding

Encouraging a child to think

- Be a good listener
- Accept thoughts and words inside a child and engage in bringing them out
- Share interests and feelings at the same eye level as a child

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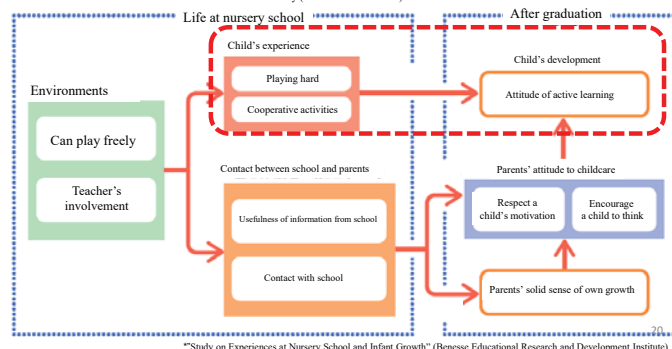
Relation between Babyhood and Upper Elementary Class

4. Relation with ECEC

Cultivating an “attitude of active learning” is related to “playing-hard experiences” at nursery school.

< Major relations identified in the study >

* Arrows show the relations of each factor identified in the study (some are omitted here)



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4. Relation with ECCE

“Playing-hard experiences” and “cooperative activities” at nursery school are supported by “environments for free and flexible play” and “teacher’s receptive involvement”

“Playing-hard experience” indicators

1. Be creative in playing
2. Produce without teacher's help
3. Work on challenging activities
4. Play to the end with a perspective
5. Play with what one likes or is good at
6. Play as freely as one likes

“Cooperative activities” indicators

1. Work together with friends toward the goals
2. Decide roles for an event (drama casting, relays order) by themselves
3. Cooperate with friends during an event (sports day, presentation of daily life, etc.)
4. Know good and strong points of friends through personal relationship

Uniqueness

High flexibility

Demonstrated independence

Cooperativeness

“Environments for free and flexible play” indicators

1. Have plenty of time to play freely
2. Have enough equipment and materials to play freely
3. Have plenty of space to play freely
4. Have various activities to express oneself
5. Use materials and picture books suitable for each season

“Teacher’s involvement” indicators

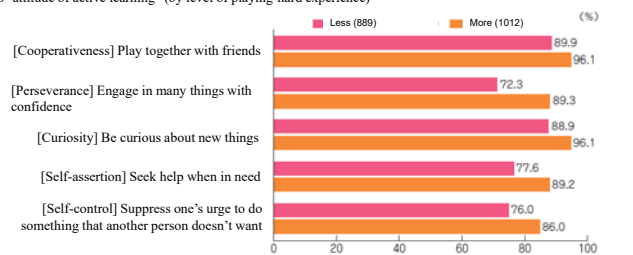
1. Respect a child’s desire to “do”
2. Talk to a child in a kind and warm tone
3. Work in cooperation with other teachers
4. Take care of a child in a free atmosphere
5. Be aware of parents’ feelings

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4. Relation with ECEC

The harder a child plays at nursery school, the more developed his or her “attitude of active learning” becomes during the K3 period

Child’s “attitude of active learning” (by level of playing-hard experience)



* “Study on Experiences at Nursery School and Infant Growth” (Benesse Educational Research and Development Institute)

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3) Borderless Research Network

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Child Research Net: Children are Our Future

Child Research Net (CRN) is an internet-based child research institute established in Japan in 1996 to solve problems about children in the world. The institute is operated with support from Benesse Educational Research and Development Institute.

<Characteristics of CRN>

- [Interdisciplinary research]** Collect and disseminate a wide range of research insights from children’s biological to social viewpoints, from medicine, neuroscience, childcare, education, developmental psychology and sociology.
- [Research theme]** Social and emotional skill, play, media, developmental disability, ECEC, maternity care, neuroscience, mental care, rights, bullying, etc.
- [Media]** Website (J/E/C), Facebook (J/E), Twitter (J), Weibo (C), and other offline international conferences and symposia.



Noboru Kobayashi
 (Founder and honorary director of CRN)
 M.D., Professor Emeritus of the University of Tokyo, President Emeritus of the National Children’s Hospital.



Yoichi Sakakihara
 (Director of CRN)
 M.D., Professor Emeritus of Ochanomizu University. Regular advisor of Benesse Educational Research and Development Institute, Director of Japanese Society of Child Science. Specializes in pediatric neurology, developmental neurology (in particular, clinical practice in developmental disorder such as ADHD, Asperger’s syndrome) and neuroscience. Hobbies including mountain-climbing and music appreciation. Father of two boys and one girl.

Current Activities Mainly in Asia

CRN website

Available in three languages (Japanese, English, Chinese (simplified and original))



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Child Research Network Asia (CRNA)

Working on solving problems for children in Asia. Major operation areas are Japan, China, India, Indonesia, South Korea, Malaysia, the Philippines, Singapore, Taiwan, and Thailand.



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International symposium

Thank you for your attention

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