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# Toward the construction of educational practices grounded in the conceptual system of cultural-historical psychology

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#### Abstract

The paper analyses how key concepts of cultural-historical psychology — zone of proximal development, joint activity, vraschivanie (the cultural grafting of individual action), pereghivanie, sign mediation, and reflection — can serve as design principles for effective educational practices and technologies. Three practices are examined in detail: the reflexive-activity approach (RAA), which helps learners overcome academic difficulties and stimulates both cognitive and personal development; the diagnostic technique "Mosaic," devised to assess the formation of meta-disciplinary competences in primary-school children through the organisation of cooperative activity; and "Multimedia-Theater," a qualitatively new form of organising adolescents' learning activity that, by means of systematically arranged role experimentation, fosters the central neoformations of this age period. The cases show how the core principles and propositions elaborated by L.S. Vygotsky — and later developed by his students and followers — can be effectively integrated into contemporary educational practice.

**Keywords:** cultural-historical psychology, educational practice, reflexive-activity approach, multimedia-theater, role experimentation, diagnosis of meta-disciplinary competences, joint activity, zone of proximal development, reflection, pereghivanie, vraschivanie, sign mediation

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## К проблеме конструирования образовательных практик на основе системы понятий культурноисторической психологии

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#### Резюме

В статье рассматривается применение фундаментальных понятий культурно-исторической психологии — зона ближайшего развития, совместная деятельность, вращивание, переживание, знаковое опосредствование, рефлексия — для проектирования эффективных образовательных практик и технологий. Особое внимание уделяется таким практикам, как рефлексивно-деятельностный подход (РДП), направленный на оказание помощи учащимся в преодолении учебных трудностей и способствующий их когнитивному и личностному развитию; диагностическая методика «Мозаика», задачей которой

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выступает оценка сформированности метапредметных компетенций учащихся младшего школьного возраста в области организации совместной деятельности; «Мультимедиа-театр», позволяющий через специально организованный процесс ролевого экспериментирования формировать центральные новообразования подросткового возраста и являющийся одной из качественно новых форм организации учебной деятельности подростков. Представленные в статье практики наглядно демонстрируют, каким образом основополагающие принципы и положения культурно-исторической психологии, заложенные Л.С. Выготским и впоследствии развивавшиеся учениками и последователями его научной школы, могут быть эффективно интегрированы в образовательный процесс.

**Ключевые слова:** культурно-историческая психология, образовательная практика, рефлексивно-деятельностный подход, мультимедиа-театр, ролевое экспериментирование, диагностика метапредметных компетенций, совместная деятельность, зона ближайшего развития, рефлексия, переживание, вращивание, знаковое опосредствование

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### Introduction

It is impossible to discuss cultural-historical psychology (CHP) solely in theoretical terms without considering how its fundamental principles are implemented in practice - and, in fact, how they serve as the foundation for practical psychology. As I.V. Dubrovina states, "L. =S. Vygotsky largely predetermined the development of practical child psychology" (italics in the original) [6], drawing specific attention to the words of L. Binswanger, who observed that "there is no science in which theory and practice follow such divergent paths" [4]. For Vygotsky, it was evident that the crisis in psychological science (the echoes of which we still experience today) was largely due to the fact that: "...practice was a colony of theory, entirely dependent on the metropolis; theory, in contrast, was not dependent on practice at all. Practice was considered a deduction, an application, generally an operation outside of science, post-scientific, beginning only where scientific activity was thought to have ended. The success or failure of practice did not in any way affect the fate of theory" [4].

Vygotsky saw the solution in the inseparable synthesis of these two domains: on the one hand, practice, which "poses problems, serves as the supreme judge of theory, as the criterion of truth, and dictates how concepts should be constructed and how laws should be formulated" [4]; and on the other, a living system of developing concepts that form both the methodology and the method of investigation. The unity of practice and methodology is the key principle of CHP that elevates it beyond the status of a conventional theory and grants it paradigmatic significance.

This principle of unity between methodology and practice finds full expression in the experimentalgenetic or genetic-modeling method developed by

- L.S. Vygotsky. Its key feature enabling it to serve both as a research method and as a conceptual model for practical tools is its focus on reproducing the genesis of higher mental functions (HMFs) and cultural forms of behavior and activity. For this reason, the method is also known as the formative experiment. It is built upon the conceptual unity of a set of notions that constitute the theoretical-methodological framework of CHP:
- The concept of cooperation reveals the role of social interactions that unfold in the form of emotionally significant, "dramatic" events;
- The concept of sign/sign mediation emphasizes the key role of cultural means (signs, symbols, and symbol systems) that initially function as tools of social communication between participants;
- The concept of vraschivanie identifies the mechanism of development;
- The zone of proximal development defines the leading role of learning as a driving force of development:
- The concept of pereghivanie affirms the principle of unity between affect and intellect;
- The concept of reflection highlights the child's individual activity in mastering cultural modes of action.

Each of these concepts both characterizes a specific aspect of objective reality studied by CHP (the structure of consciousness, the relationship between learning and development, between natural maturation and cultural growth, the sources of development, etc.) and imposes specific requirements on the organization of research and professional practice. What is crucial here is that the distinction between the researcher and the practitioner is minimal. The practitioner operates with scientific concepts as tools, means of organizing activity aimed at the formation, development, or correction (depending on their specialization) of higher

mental functions, behavior, and forms of activity in the child. The researcher, by contrast, is focused primarily on studying the concepts themselves, for whom "...their correspondence to facts is merely a means, a technique, a way of verifying their applicability" [4]. But even this distinction is provisional. Every practitioner, in fact, evaluates the suitability of the concepts they use (together forming a method) in terms of the effectiveness with which they achieve their intended outcomes. In this sense, I.V. Dubrovina rightly notes that "...a psychologist does not only — or even primarily — study and investigate, but rather helps and constructs" [6]. In this way, thanks to L. S. Vygotsky, the practical psychologist and the research psychologist were reconciled: every cultural-historical psychologist became both a practitioner and a researcher.

It is also important to note that none of the concepts forming the methodological foundation of CHP can be regarded in isolation as "self-sufficient" or "exclusively explanatory" (see Vygotsky's critique of such an approach in The Historical Meaning of the Crisis in Psychology [4]). Nevertheless, in any particular study or practice, a given concept may serve as a system-forming one. The following sections present several educational practices based on the holistic methodological system of CHP concepts — each of which unfolds the system in its own way, depending on which concept predominates. Moreover, each practice illustrates the dynamic development of CHP's conceptual apparatus and shows how practical work can transform and expand the theoretical-methodological tools of this scientific tradition.

### Practice 1: Reflexive-activity approach to providing psychological and pedagogical support in overcoming learning difficulties

Reflexive-activity approach (RAA) to providing psychological and pedagogical support to students in overcoming learning difficulties represents a direction within cultural-historical psychology that can be understood as one possible realisation of L.S. Vygotsky's idea that "instruction leads development," that is, the notion of developmental instruction [5]. Its full name is: a practice of psychological and pedagogical support for students in overcoming learning difficulties that promotes their cognitive and personal development [9].

Learning difficulty is understood not as a deviation from the norm, but as an inherent aspect of the educational process — and as a resource for development. According to L.S. Vygotsky, educational activity implies that the child attempts what they have not yet mastered; hence, errors and difficulties naturally arise, which create a need for adult assistance. If a child per-

forms only what they can already do independently, no development occurs. On the other hand, if the task is incomprehensible and entirely beyond the child's reach, it will not foster development and may even be harmful. Therefore, learning difficulties are necessary for both instruction and development: they create the conditions and motivation for developmental movement.

For this reason, the RAA does not aim to prevent or correct learning difficulties. Rather, it seeks to support the child in overcoming them in a way that contributes to development. What kind of developmental steps are we speaking of? Vygotsky does not answer this question directly, but in Thought and Language, he writes that "one step in instruction may mean a hundred steps in development" [3]. These steps, therefore, may take various forms and proceed in different directions. In the practice of the RAA, many cases have indeed shown that one instructional step can catalyse multiple steps in development [10]. But how is this possible?

The central mechanism linking instruction and development in CHP is the concept of the zone of proximal development (ZPD) – a key construct in the RAA. Drawing on reflective analysis of support practices with children, adolescents, and adults, as well as on a careful reading of Vygotsky's writings on the ZPD (which, notably, were underexplored by many of his followers), the RAA has significantly reinterpreted this concept. It now employs a multi-vector model of the ZPD, which describes the mechanisms linking instruction to development across several axes: cognitive, personal, and social. That is, development in the context of overcoming learning difficulties may unfold along several vectors, and the model also incorporates a mechanism of self-development, which helps explain Vygotsky's claim that one step in instruction can mean a hundred in development [8].

Self-development becomes possible when the student takes a subject-position in the learning process [11], becoming the agent of action and reflection — in other words, the agent of overcoming their own difficulties. Meanwhile, the adult (teacher, psychologist, parent, etc.) takes on the role of helper, consultant, or collaborator.

In this way, the RAA implements in practice one of Vygotsky's fundamental ideas: that development occurs through cooperation between the child and adult, when the child receives assistance within the ZPD.

While Vygotsky never formulated this thesis explicitly, it can be inferred from his texts. Unfortunately, he did not manage to develop a full account of what kind of assistance promotes development. Though he offered many examples, he left unanswered the questions of how, by what means, and under what conditions adult support can actually foster development.

It is clear, however, that not all assistance within the ZPD is developmentally productive.

Therefore, the RAA — as a practice (or technology) of developmentally oriented assistance — devotes significant attention to the following questions: "How should we help?", "How should we not help?", and "In what ways can help be given?" Accordingly, the theoretical core of the RAA, which is closely integrated with its technological aspect, is described as a triad:

- Principles the commitments that a specialist in the RAA seeks to realise in practice;
- Constraints prohibitions that follow logically from these principles;
- Technologies examples of how the principles and constraints are enacted in concrete support situations.

This triad is supplemented by a fourth component — situations, that is, the question of when assistance should be provided.

The activity of a specialist working within the RAA can be described as a sequence of acts (a term used by Vygotsky himself) or actions carried out in diverse contexts of interaction, when the child seeks help or clearly needs it. If we assume that the key moment in a learning situation is when the child encounters difficulty and cannot complete the task independently — yet feels the need to advance in learning and development — then the adult must create such a situation of difficulty, but one that remains within the child's ZPD.

Technologically, this is achieved by presenting the child with a sequence of tasks of increasing complexity. This makes it possible to identify which tasks the child can complete independently and at which point they begin to encounter difficulties or make errors. This marks the lower boundary of the ZPD in relation to learning activity. If the task sequence is sufficiently long, there will come a point where the child no longer understands what is required of them and cannot even consciously accept assistance. This constitutes the upper boundary of the ZPD.

Thus, the lower boundary lies between the ability and inability to act independently, and the upper boundary lies between the ability and inability to engage in conscious cooperation with an adult. Incidentally, when Vygotsky emphasises the importance of consciousness in adult — child interaction, he explicitly rejects the then-popular term "intellectual imitation" and instead speaks of the child's actions as carried out in cooperation or under the guidance of an adult (see [2], [3], [5]).

In the RAA, difficulty and error are never viewed as accidental. Indeed, correctness may be accidental — for example, if a child does not know whether to write "a" or "o" in a word, they might guess correctly 50% of the time. But if they make a mistake, it is not

accidental. Difficulties and errors are understood as indicators of inadequately formed strategies of action.

For instance, primary school children often write words "as they hear them," without considering that some sounds in Russian are not represented by their "own" letters, or that the number of sounds exceeds the number of letters, requiring deliberate analysis to determine which letter (or combination) corresponds to a given sound.

Hence, working on the method of action means helping the child recognise and reconstruct their approach. The core principle here is reliance on reflection. Reflection enables the child to become aware of their way of acting, to liberate themselves from its automatic hold (as children and adults alike often act without understanding what, how, or why they are doing something), to grasp what needs to be changed in their method, and then — either independently or again with the adult's reflective support — to reorganise their action strategy.

The moment in a lesson when the student is working on the transformation of their method of action is of critical importance for the child's development. If, at the moment of difficulty — when reflective work on understanding and restructuring one's action is underway — the adult intervenes by suggesting a solution, demonstrating an example, or offering other instrumental help, then the opportunity to take developmental steps is lost [15], because the intellectual effort that could have led to development is performed by the adult instead of the child.

For this reason, a practitioner working within the RAA does not rush to intervene. They hold a pause, waiting to discern whether the child has exhausted their internal resources or still has reserves. The adult intervenes only when it becomes clear that the child has done everything they can. In such cases — resembling a "block" situation in the process of solving a creative task [7] — the adult seeks not to compensate for the child's instrumental deficit, but rather to support them in overcoming a reflective deficit, posing reflective (non-leading) questions that help the child remain the subject of the difficulty-overcoming process. In doing so, the well-known maxim of Maria Montessori, "Help me do it by myself" [14], is realised, as is Immanuel Kant's idea that a child should arrive at correct thinking independently [12].

From the standpoint of the RAA, instrumental help can be likened to attempting to insert a foreign part into a functioning mechanism — one that doesn't quite fit — or replacing one part with another. By contrast, the metaphor for reflective help is organic: under the child's own active efforts, supported reflectively, new functions "grow", like branches of a tree. L.S. Vygotsky also employed an organic metaphor when he described the processes occurring in the

ZPD as involving the child's appropriation of shared experience — what he called vraschivanie. But this is a kind of vraschivanie that leads to the cultivation of new methods, functions, personal qualities, and relationships. Vygotsky emphasised that the concept of the ZPD can be extended to the personality as a whole [5]. After all, joint efforts are not limited to solving math or language problems. One can also jointly work through: a passive attitude toward learning, a habitual refusal to understand the teacher, unwillingness to exert effort, inability to reflect on one's own actions, or the inability to cope with anxiety, fear, or agitation.

It is precisely this explanatory and constructive potential of the ZPD that has led, in the 21st century, to its adoption not only in developmental and educational psychology, but also in pedagogy, counseling, psychotherapy, coaching, organizational psychology, and beyond.

The core principles of providing assistance to students in overcoming learning difficulties via the RAA include:

- Establishing a relationship of cooperation;
- Supporting the child's subject-position;
- Creating a situation of difficulty during the lesson;
- Working within the student's ZPD;
- Providing help grounded in reflection;
- Working with the method of action;
- Establishing and maintaining positive emotional and meaning-based contact;
- Ideally, working at the epicenter of the ZPD, that is, with the key difficulty whose resolution would most effectively promote development.

The greatest developmental effect of assistance is observed when the child overcomes learned helplessness: that is, when they perceive themselves as incapable of overcoming difficulties, do not believe in success (self-efficacy is "at zero"), and refrain from effort, convinced it would be futile ("nothing will work anyway"). Suddenly, with adult help, the child discovers that they can cope with the difficulty on their own—the adult did not do it for them, but helped them do it themselves. In that moment, the child has a kind of epiphany: they realise they can act independently. Where before there was a conviction—"I'll never manage,"—there now emerges a new one: "I can do it, I just have to figure out how." (see, e.g., [10]—the case of the student O. and the case of Pasha).

The RAA, as an approach to providing developmentally oriented psychological and pedagogical support, first began to take shape in 1997 [9] and has since been applied to work with a wide range of children and adults: students in general education schools who experience learning difficulties; orphans (including those with disabilities or severe somatic illnesses); adolescents with deviant behavior; teens undergoing rehabilitation from substance abuse; university stu-

dents; and adults with disabilities. The range of issues for which the principles and elements of the RAA are appropriate has continually expanded. Today, the field is shifting from the classic dyad "instruction — development" toward a triadic model: "education — development — health", in which education (instruction) is seen as the driving force of development (leading it forward, in Vygotsky's terms), and development is seen as a condition for mental health [23].

### Practice 2: The diagnostic method "Mosaic"

Within the framework of cultural-historical psychology (CHP), the concept of cooperation — between children and adults, and between children themselves — occupies a central position as a source of development. This is fully expressed in the fundamental law of the development of higher psychological functions (HPFs): "Behind all higher functions and their relations stand genetically social relations — real relations — homo duplex (the double human being). Hence, the principle and method of personification in the study of cultural development: the division of functions between people — the personification of functions. For example, voluntary attention: one person masters, the other is mastered. Again, the division in two of what is fused in one - an experimental unfolding of a higher process (voluntary attention) into a miniature drama." [1] This proposition, along with L.S. Vygotsky's ideas on the leading role of instruction in development and on the formation of scientific concepts in children, received practical elaboration in the Elkonin—Davydov system of developmental education. Within that framework, a key problem was the original form of learning activity as a collectively distributed activity — shared among children and adults, and among children themselves. Later, methods for organising such collectively distributed forms of educational activity were systematically developed in the works of V.V. Rubtsov, V.V. Ageev, Yu.V. Gromyko, R.Ya. Guzman, A.Yu. Korostelev, A.V. Konokotin, and others. Their research has produced empirical evidence of the positive impact of collective activity on students' cognitive development. In particular, in studies led by V.V. Rubtsov ([17], [18]), the socio-genetic method was developed to investigate the formation of concepts in childhood. This method foregrounds the concepts of cooperation and joint activity as system-forming elements within the general methodological framework of CHP. As V.V. Rubtsov writes: "The foundation of this method lies in the principle of mutual mediation between the object-related structure of the task and the structure of joint activity: the content of the object, which defines the conceptual content being mastered, is mediated by the

modes of interaction among participants in a given social situation." [16] This approach has formed the basis for the concept of the cultural-historical type of school [19].

In the practice of developmental education, a crucial role is played by the organisation of diverse forms of meaningful interaction between students as they search for ways to solve learning tasks. This interaction serves, on the one hand, as a source and driving force of children's cognitive development, and on the other, as a mechanism of their socialisation. Creating conditions — and more than that, provoking students to engage in discussion, debate, and expression of viewpoints using sign-symbolic tools (e.g. diagrams, models) — is a distinguishing feature of developmental education compared to traditional educational practices. The aim of such dialogue is to generate a new mode of action in a problem situation, one that is collectively produced in the course of solving the task [20]. Consequently, one essential requirement for any diagnostic tool used to assess the developmental effects of primary education is that it must establish both quantitative and qualitative indicators of students' communicative competence. These competences are expressed in the construction of productive educational interactions and in the organisation of joint actions aimed at solving a common task [22].

The "Mosaic" method models such collectively distributed joint activity, oriented toward collaborative problem solving, and enables both quantitative evaluation and qualitative description of how interaction is constructed within a group. It allows researchers to observe how group dynamics evolve and how they can be adjusted or improved over the course of the collective search for a solution [21].

### 1. Operating principle

The Mosaic method simulates a situation in which students must engage in collectively distributed activity to solve a shared task. Elements of a mosaic are distributed among participants in a group, and these elements must be assembled to form specific geometric figures. Importantly, participants do not know in advance what figures are to be assembled, nor which elements their peers possess. Thus, the practical task — assembling four geometric shapes — becomes a search task, requiring participants to identify the possibilities available within two sets of constraints:

- Object-level constraints, such as the form and size of the mosaic pieces;
- Social-level constraints, arising from the distribution of elements across the group members.

Only by coordinating the search for geometric configurations with the coordination of individual capabilities — that is, determining who possesses which elements — can the task be successfully completed.

Furthermore, in the course of solving the problem, the group must generate its own means of communication, tailored to the specific demands of the task. This includes developing a shared language for describing one's own pieces or missing components of the mosaic.

The Mosaic method possesses several distinctive features:

- The central requirement of the model is to create conditions under which the task can be solved only through interaction among group members. To achieve this, the puzzle elements are distributed so that no individual participant can complete the task alone. Moreover, since each of the four target geometric figures is pre-divided into two parts, success at each stage (i.e., assembling one figure) requires cooperation between two group members who hold the necessary pieces. However, it is not known in advance who possesses which pieces this must become the subject of group discussion and problem-solving.
- The task must be simple. Since the object of study is the ability to organise productive group interaction around a shared goal, the outcome should be determined not by the difficulty of the task but by the quality of communication and cooperation.
- The method is designed not merely to register the presence or absence of interaction, but to allow for measurement and substantive analysis of its effectiveness, techniques, and dynamics throughout the problem-solving process. To support this:

The task materials are selected so that students have multiple attempts at solving the problem. In Mosaic, the group is asked to assemble four geometric figures, giving participants the opportunity to test hypotheses and assess strategies during the process — not just retrospectively.

A procedure is designed that artificially complicates direct problem-solving and necessitates strategy building, hypothesis generation, and substantive communication. For this reason, the materials include: inappropriate elements (e.g., pieces that are similar in size, shape, or colour but incorrect), extraneous pieces (not part of any target shape), fully formed distractor shapes, and visual barriers that prevent participants from seeing one another's pieces. Each of the four group members can see only their own set, which is hidden from others.

The material itself is deliberately "noised": irrelevant features such as colour are included; distinctions between suitable and unsuitable elements are made subtle (size, shape); and figure segments are cut in ways that may lack clear geometric names — or names at all.

• These strict constraints on the structure of the collectively distributed task ensure that the entire process is forced onto the verbal plane. This enables researchers to record and analyse verbal data on how students: conduct analysis, formulate hypotheses, de-

velop a shared descriptive language, identify and analyse errors, etc.

### 2. Materials

The Mosaic task is built around a simple puzzle: 16 coloured mosaic tiles from which four geometric figures can be assembled (a circle, square, triangle, and hexagon — or parallelogram). Each figure consists of only two parts. The full set also contains extra pieces that do not fit any of the listed shapes due to differences in form or size. The pieces are divided into four equal sets, distributed in such a way that no set contains both parts of any one figure. These sets are assigned to the four members of the group. As a result, each child holds a set of elements that is insufficient to solve the task alone — the assembly of every shape requires cooperation.

### 3. Indicators of effectiveness

A key advantage of Mosaic compared to other diagnostic tools for assessing social competences is that it provides an objective indicator of effective group interaction: the number of geometric figures successfully assembled. This indicator reflects the accuracy of the group's collaborative solution. Observation of the group's activity during the task enables the researcher to identify:

The group's strategic approach,

The quality and content of group communication, How interaction unfolds and changes throughout the process.

Analysis of results obtained using the Mosaic method has shown that students in traditional education experience serious difficulties in constructing productive group interaction. Although they enjoy the activity and the task, their communication and problem-solving efforts proceed in parallel, failing to integrate - which results in very low group performance. By contrast, in schools employing developmental education, where children engage in inquirybased learning and are encouraged to communicate and collaborate while solving tasks, students show entirely different strategies. Their interaction is taskoriented; they build shared tools (e.g., ways of describing elements), develop a common language, plan steps, monitor interim results, and adjust their methods of cooperation accordingly. Large-scale statistical analyses demonstrate that students in developmental education settings perform 2.4 times better than those in traditional schools. These results confirm the effectiveness of the developmental education system, which is grounded in the practical implementation of cultural-historical psychology. The Mosaic method, therefore, provides strong diagnostic support for evaluating the development of social competences in primary school students.

### Practice 3: The "Multimedia-Theater" model of organizing adolescent theatrical activity

The theoretical foundations of L. S. Vygotsky and his followers provided the basis for an innovative educational practice known as "Multimedia-Theater", developed at the Center for Interdisciplinary Studies of Contemporary Childhood at MSUPE under the direction of O.V. Rubtsova between 2019 and 2023. The Multimedia-Theater represents a unique form of organizing theatrical activity among adolescents, aimed at their development, learning, and social formation. Unlike other forms of adolescent drama in education, this model creates conditions for role experimentation — a process through which teenagers explore new social roles and forms of community (obschnost).

O.V. Rubtsova conceptualizes role experimentation as the leading activity of contemporary adolescence. Through it, adolescents interiorize — vraschivayut — a system of social roles as culturally mediated signs. Drawing an analogy with Vygotsky's concept of pereghivanie, Rubtsova treats the social role as *a unit of personality and environment*, in which the external (social) and internal (personal) dimensions are unified.

The authors of the practice emphasize that, within a specially designed theatrical environment, adolescents do not merely perform roles — they engage in a creative reinterpretation of the social meanings of roles through their own individuality. In other words, adolescents do not simply act out scripted roles on stage; rather, they infuse them with their own life experience, personal values, and orientations. This results in *the personal experiencing of the role*, which manifests in the form of *pereghivanie*.

In addition, Multimedia-Theater intentionally constructs "micro-dramas" — brief, emotionally charged situations in which adolescents externalize (extroject) their inner contradictions and psychological conflicts. During sessions, participants engage in theatrical exercises, etudes, and improvisations that place them in imagined but psychologically meaningful scenarios. The emotional responses that arise in these moments are not treated as side effects but as central developmental mechanisms. These emotional processes enable adolescents to make qualitative shifts in the formation of key age-specific neoformations — particularly self-awareness and reflection.

Thus, the Multimedia-Theater allows educators and psychologists to purposefully construct the adolescent's *zone of proximal development (ZPD)* by coordinating two complementary developmental processes:

• *Interiorization* of new cultural signs (roles), through which adolescents, in the context of rehearsal and performance, acquire new forms of role-based interaction and models of community;

• *Exteriorization* of internal conflicts, expressed outwardly through symbolic theatrical forms on stage.

In this model, interiorization means that adolescents assimilate new ways of relating and acting through their theatrical engagement. Exteriorization, in turn, refers to the artistic expression of inner psychological tensions typical of transitional age. The Multimedia-Theater thus stands as a compelling example of how pereghivanie becomes a psychological-pedagogical instrument: it is not treated as a spontaneous emotional occurrence, but is intentionally embedded in the educational design of the activity. It becomes the central mechanism through which developmental effects are achieved.

The practical implementation of Multimedia-Theater in school requires a special organisation of the educational process. The experience presented in the works of O. V. Rubtsova and T. A. Poskakalova shows that introducing this model is possible both within extracurricular activities (electives, clubs) and by integrating elements of drama into subject curricula (not only in the humanities). From 2019 to 2025, the model was piloted in a number of schools in Moscow and the Moscow region, covering a total of over 700 adolescents aged 13—15.

Based on the results of piloting the model, the authors of the project formulated the main principles for organising theatrical activity with adolescents:

First, the model is oriented not so much toward the creation of an artistic product as toward *the processual* aspect of theatrical activity. The emphasis on process is linked to the fact that the main goal of Multimedia-Theater is the construction of the zone of proximal development of adolescents, not the staging of a play as such.

Second, the model involves *a variety of types of activity* and the active participation of adolescents at all stages of the project. The key task of Multimedia-Theater is to create conditions for role experimentation. Unlike traditional drama clubs, where students usually rehearse roles based on a prewritten script, in this model adolescents are engaged in *a complex of diverse activities* related to the preparation and realisation of a performance. They not only act on stage, but also participate in script writing, directing and acting training, technical support, and working with *digital technologies*, including filming and editing videos that later become part of the performance (hence the name Multimedia-Theater).

Third, the model must be clearly structured by implementation stages: from motivational introduction (getting acquainted with the project), through the stages of script development, rehearsals, and creation of multimedia elements, to the final performance. Each stage has its own objectives and content, which can be flexibly modelled based on the characteristics of the specific learning group. Particular attention is given to the engagement stage: it is important to form adoles-

cents' *internal motivation* for participating in theatrical activity, especially considering that many may have no prior experience with such projects. At this stage, voicing expectations, emotions, and possible fears by the students themselves is used to reduce anxiety before engaging in this new type of collective activity.

Fourth, it is very important that Multimedia-Theater presupposes a rejection of traditional pedagogical hierarchy: here the teacher acts as a co-participant in the adolescents' creative activity, not imposing their own ideas or a fixed script. The teacher's role is to moderate discussions, help formulate ideas for the performance, and — most importantly — to create conditions for reflection, during which participants can rethink the experience and pereghivaniya that emerge throughout the work on the performance.

Over the course of six years of research, the Multimedia-Theater project has demonstrated its high significance for solving a wide range of educational, developmental, and pedagogical tasks. Its potential for implementation is visible both at the level of individual schools and systemically — including in the context of programs for education and prevention of juvenile delinquency. Let us consider several key aspects of the model's significance, supported by empirical data:

### 1. Development of soft skills and meta-subject competencies

Regular participation in Multimedia-Theater leads to noticeable improvements in adolescents' communication skills, creative abilities, self-esteem, and reflection. According to a longitudinal study (Poskakalova & Khusnutdinova, 2024), over two years of participation in the project, students showed statistically significant improvements in offline communication and levels of socialisation (ability to cooperate, adopt social norms). Importantly, these positive changes were stable: the skills acquired in the first year persisted into the second year of the project. The study also showed that Multimedia-Theater supports the development of an active, competent communicative position — adolescents become more confident in real-life social interaction. These findings are consistent with the results of 2020, where already after several months of participation in the theater project, students demonstrated growth in communicative and regulatory learning actions, as well as improvement in academic performance. Thus, Multimedia-Theater contributes to the development of 21st-century skills: collaboration, creativity, emotional intelligence, critical thinking, and others.

### <u>2. Upbringing and the formation of value orientations</u>

Theatrical activity, integrated into the educational process, provides broad opportunities for *the formation* of adolescents' value orientations. Through choosing

performance topics and collective enactment of moral dilemmas, students internalise ethical concepts and values. Within the project, adolescents themselves create scripts that address issues relevant to them, such as bullying, responsibility in social media, relationships with parents, questions of conscience and duty. The collected data confirm that during the project, participants of Multimedia-Theater interiorised humanistic values — they became more tolerant, empathetic, and conscious in their actions. Teachers in various schools and classrooms also reported positive changes in the behaviour of at-risk adolescents: many showed a decrease in aggression and an increase in responsibility. In several schools, the model has proven to be an effective tool for the prevention of risky and deviant behavior.

### 3. Relevance to current school challenges and federal educational standards (FGOS)

The pedagogical significance of Multimedia-Theater is also confirmed by its relevance to pressing problems in contemporary schooling. First, the crisis of motivation among adolescents. Today, the psychological-pedagogical community points out that traditional lesson formats struggle to hold the attention of teenagers who are immersed in gadgets and the Internet. Multimedia-Theater offers them an activity close to their culture (including work with video, digital storytelling), thus restoring interest in offline interaction. Second, the problem of fragmentation and conflict among adolescents, especially in large schools. Joint theatrical work has a strong unifying effect: children learn to collaborate, understand one another, and respect differing viewpoints. Third, the model correlates with new educational standards, enabling the formation of personal educational outcomes and competencies in accordance with FGOS.

### 4. Flexibility and scalability of the model

An important advantage of the model is its adaptability to various contexts. Multimedia-Theater can be implemented both in urban and rural schools, as it does not require expensive equipment or props. Furthermore, the experience of Multimedia-Theater may be useful for out-of-school institutions (creative centers, youth clubs), and even in correctional education: there is evidence of participation by children with developmental disabilities, who were also successfully engaged in the project.

Thus, the pedagogical significance of the Multimedia-Theater model lies in the fact that it offers a modern, scientifically grounded response to the challenges of education in adolescent schools. It is not just an amateur drama club, but an activity-based educational technology whose effectiveness is confirmed by empirical research. It combines development and learning, contributes to group cohesion, serves as a means of preventing adolescent risk behaviors, and at the same time integrates harmoniously into the educational process. In the current context of searching for new forms of organising educational activity (including in the framework of the national project on creating school theaters), the accumulated experience of organising theatrical activity represents significant practical value for the education system as a whole.

### Conclusion

The examples of psychological practices in education presented in this article — practices developed on the basis of the fundamental concepts of cultural-historical psychology (CHP) — serve as an illustration of the heuristic potential of its theoretical propositions and of the possibilities for unfolding the ideas of L.S. Vygotsky, above all for solving practical problems related to creating conditions for students' development within the educational process. Moreover, the practices discussed here demonstrate the "living nature" of cultural-historical psychology: while rooted in the fundamental concepts of this scientific school, they themselves reveal new aspects of its methodological and methodical foundation. Reflexive-activity approach places at the center the concepts of zone of proximal development and reflection, emphasizing their system-forming role within the conceptual apparatus of CHP — particularly in the way they allow us to understand child — adult cooperation as the creation of a reflective space, within which the child masters new methods of action that enable them to overcome learning difficulties. Initially, the child acts by means of these strategies together with the adult (within the ZPD), and then, through reflection, the child appropriates them. In this way, shared experience is vraschivayetsya (grafted) into the child — or interiorized. The Multimedia-Theater model and the Mosaic diagnostic method, in turn, represent the practical implementation of the socio-genetic method, which regards as the key mechanism of cognitive development the process of qualitative transformation of the social situation, driven by the development of forms of joint, collectively distributed activity.

Today, cultural-historical psychology is experiencing a new and vivid period of flourishing. Interest in the work of L.S. Vygotsky and his followers remains strong both in Russia and internationally. Increasingly, researchers are focusing on the application of Vygotsky's theory to a broad spectrum of practical tasks — social, psychological-pedagogical, and educational. It is evident that the future prospects of applying CHP in practice depend on an understanding of this approach as a coherent conceptual system, one that reveals the inseparable unity of its object and its method.

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### Contribution of the authors

The authors' contribution is equal.

All authors participated in the discussion of the results and approved the final text of the manuscript.

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The authors declare no conflict of interest.

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#### **Ethics statement**

The collection of empirical data was carried out anonymously. All subjects participating in the study gave voluntary consent to fill out the survey forms.

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