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Print ISSN: [3006-2497](#) Online ISSN: [3006-2500](#)Platform & Workflow by: [Open Journal Systems](#)**Individualized Education Programs (IEPs): Policy, Practice, and Progress****Prof. Dr. Muhammad Naseer ud Din**

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dr.naseerruddin@kust.edu.pk**Abstract**

Individualized Education Programs (IEPs) are critical tools designed to ensure students with disabilities receive tailored educational services under the Individuals with Disabilities Education Act (IDEA). This paper examines the policy framework, practical implementation, and challenges of IEPs, emphasizing their role in promoting equitable access to education. Key components of IEPs include measurable annual goals, present levels of performance, and specialized services, all developed collaboratively by educators, parents, and specialists. Despite their legal mandate, challenges such as resource limitations, communication barriers, and inconsistent implementation persist, often hindering their effectiveness. The paper also explores trends like inclusion and technology integration, alongside future directions for enhancing personalization and policy alignment. By addressing these challenges and leveraging best practices, IEPs can better serve their intended purpose of fostering academic and social success for students with disabilities.

Keywords: Individualized Education Program (IEP), Special Education, IDEA, Inclusion, Measurable Goals, Parental Participation, Resource Limitations, Assistive Technology, Policy Implementation.

Introduction

The main goal of special education is to provide students with special needs, equal access to education, and to prepare them for a productive and independent adult life. The Individualized Education Program (IEP) process, which culminates in a statement of special education services for the child, was designed to implement these goals by mandating that states receiving federal funds develop procedures for identifying children as disabled and providing appropriate services to those children (A. Rosenbaum, 2001). The 1997 amendments to the federal education law added provisions for the IEP process to support the students' access to the general education curriculum as the context for increasing the likelihood that students would prepare for independent adult lives.

In the IEP process, the student's parents have a number of important rights, including the right to participate in the process (i.e., to attend the meeting and invite others) (Şenay İlik & Konuk Er, 2019). Because parents began documenting their own observations of what was happening, some school officials became anxious with the prospect of having parental observers at meetings and began holding baseless or informal meetings without their presence. This, combined with a number of other complexities involving special education identification and placement, made it difficult for many parents to know what to expect from or how to prepare for the process. By identifying one principle and some basic steps for parents to take, they can better support the parents of students newly identified as disabled by the special education eligibility process. Each student with disabilities has the right to have their needs considered by a team trained to evaluate all aspects of those needs and to develop and implement a plan to meet them within

30 days of determination of eligibility. In practice, this takes the form of the IEP. In preparation for the Team meeting, parents should write down answers to questions that agents of the school may ask.

Legal Framework Governing IEPs

Two laws, IDEA and Education Law, govern IEPs in the U.S. The designation of a Learning Disabled student must meet the definition of “specific learning disability,” in New York State Education Law Section 4401 et seq.; and therefore needs the requisite diagnostic assessments as per the Department of Education Commissioner's Regulations Section 200. Means “individualized education program.” The term “IEP” refers to a written document for a learning disabled child prepared by the “committee on special education.” The reference “program” and “educational program” as defined in Education Law Section 4401, include designating the need for special education (A. Rosenbaum, 2001).

The term “Additional Services” means those services, or services in addition to special education or related services, which are necessary to help a pupil with a disability benefit from the educational program. The term “Department” means the New York City Department of Education. The term “school district” means the New York City Department of Education. The term “school year” means the twelve-month period commencing on July 1, in any year, and ending on June 30 of the following year. The term “pupil” means a person who is eligible to attend the public schools of the City. References to pupils with disabilities or to such pupils with respect to the provisions of this by-law shall mean pupils with handicapping conditions. The term Handicapping Condition means the term as defined by New York State Education Law Section 4401 soc (3) (F), which excludes fathers, mothers, sisters, brothers, mothers-in-law and fathers-in-law.

Inquiries regarding the above matters may be directed to the appropriate unit of the Department, the units being defined herein. The Individualized Education Program (IEP) means that written statement to be developed in accordance with New York State Education Law Section 4403 (3) (a). The term “related services.” In New York State Education Law Section 4402 (3) (b) (4). The term independent evaluators means persons holding a professional license or certificate to practice medicine, psychology, speech pathologist, or social work pursuant to any law of this state, or authorized by the state to provide such services (King et al., 2017).

Key Components of an IEP

The Importance of IEP Goals

The IEP is a formal document that outlines the intent of the team. It is important that the IEP statement of what a child hopes to gain from the resources provided by the school system should be framed as specific, measurable goals. The IEP should be clear about what the child is expected to learn, how learning will be measured, what accommodations will be made, and how success will be defined and reported (Toprak & Çolak, 2024). While winnable IEP proposals can include methodology or particular services, these should be viewed as a means, not an end. Goals should be prioritized and focus on obvious, qualitative academic targets with clear cut measures. Parents are entitled to data showing the baseline performance of their children to substantiate proposed goals. Parents may also benefit from keeping an ongoing anecdotal log of their child's academic performance to support their position. If a child is getting an A on a reading comprehension test, having goals involving simply being able to answer wh- questions may lead to an unwinnable IEP meeting. Conversely, if the school system does agree to services but the planned goal is an unreasonable leap from the current performance level, the lack of clarity in goals will lead to a failed implementation and resultant malfeasance on the school's part.

Once the goals are identified, it is critical to determine how they will be measured, by whom, and how often. This especially holds true for subjective tests. Parents should inquire as to who will be scoring tests so that other methods of evaluation can be agreed upon ahead of time, if possible. Prior proposals to propose tiered benchmarks to lessen the high-stakes climate or encourage the use of alternative assessments should be discussed to strengthen the position. Even if parents were to win IEP goals in these areas, however, the power shift that this would represent is enjoyed only until the end of that fiscal year.

The Process of Developing an IEP

The IEP is a carefully scripted process with some standard conventions. The IEP process has provided a structured format and habitat for dialogue between parents and team members in the past, but team members have learned to use its conventions to their advantage. Professional language can be controlled through the use of acronyms, and parents often find themselves out of their comfort zone (Sanderson and Rojas2023). Most parents know what an attorney, doctor, or accountant does, but rarely get to meet Education Supervisors. The team works for the local school system and the team contact person has almost total control over the results of the IEP process. Parents may think academic issues were agreed to in earlier meetings but learning rates and methodology are left vague and technical jargon laden. When reviewing these details in the formal IEP correspondence, parents are often shocked to realize that the team has agreed to stick with previous practices or less than wanted initiatives. Important details, terms, and events can also be conveniently left out of the IEP or meeting minutes. The unwritten agenda of getting the parent's phrases or stated goals or concerns down into "school professionalese" is also a key component to this process.

Present Levels of Performance

Present levels of performance (PLP) are a required component of the IEP (Pounds & Dr. Cuevas, 2019). Most of the IEP present level of performance statements included measurable data, but this was often stated in general terms rather than detailed for a specific area of weakness. Goals were written to state performance but did not state areas of performance as well as a descriptor for how performance would be measured. Implementation strategies and data collection were written in a simple and detailed manner. This provided a clear explanation of a strategy to increase an instructional intervention or behavior. The decision regarding the implementation of an area to address, as well as personnel responsible for the intervention, was documented in an effective way. A form to collect data regarding the implementation of the IEP, with a detailed explanation for how the intervention was to be collected, was presented. A summary of the data collection was accepted, but no further follow-up data were provided and presented at the next review.

The Learning Disabled student's present level of performance stated written expression weaknesses only were not measurable with specific data. However, it contained writing samples before and after instruction. The instructional strategies previously provided to him, including teacher modeling, age-appropriate software, behavioral intervention, and peer tutoring, were fully documented through data collection as implemented with exposure to a special education teacher. The data collected near the end of the previous year indices no improvement. Further assessment and re-evaluation of the placement for writing instruction were recommended. The Present Level of Performance (PLOP) for Timothy was presented with diagnostic assessment results outlining his weaknesses. Additionally, information regarding a write to learn activity with specific prompts, as well as the pre-writing behavioral issues observed, was documented. These were summarized, indicated changes in performance, and aimed at future goals.

Measurable Annual Goals

An annual IEP goal is a clear statement of what the student is expected to accomplish in one year. It consists of measurable criteria for assessing goal performance, evaluation procedures, and timelines for goal achievement (Alqafari, 2016). Under the Individuals with Disabilities Education Act, IEPs must contain Measurable Annual Goals designed to meet the student's needs. A highly versatile construct, "goals" can serve multiple purposes and may be written at different levels by a wide variety of individuals. Goals may be broad, but they can be evaluated only in a general way. Objectives are smaller and help to organize activities within broader goals. They are most useful to program designers and evaluators, but they have limited value in student assessment or program implementation.

Generally, measurable annual goals are objectives that have been designed to provide a measure for a broad educational goal. Measurable annual goals are included in an Individualized Education Program (IEP) to document specific accomplishments expected of the student during the IEP period. Drafting good goals may seem like a burden initially, but it is worth the investment. A good goal clearly describes "what, when, and how much." It is more likely that students will accomplish the goal if the IEP team agrees on measurable goals that are explicitly stated. In this regard, this paper first presents some ideas about better goal writing, then encourages incorporation of measurable elements in all goals prior to submitting the new annual goals (Bailey & Weingarten, 2022). Good IEP goals address the "what" part of the student's education. In general, a good goal must be measurable and vision (Dietz, 2021). Too often, better goals are perceived as some cute item for a young child that is incapable of achieving any better goal in a school system. Therefore, good goals may be "how to achieve, when to achieve and how much" from a teacher's or school administration's point of view.

Special Education Services

While special education policy is dictated by federal law, IDEA encompasses a broad set of issues that are forged in both policy and practice. It requires the collaboration of families, school districts, state educational agencies, and the federal government. IDEA also seeks to right some of the wrongs of our education system by advocating for the rights of marginalized children and their families. Included in this set of rights is a guarantee of procedures and safeguards designed to help families navigate a complex and often adversarial process.

The IEP meetings, where educational programs are planned and the specialized instruction that children will receive is determined, combine both family- and school-centered processes. It is at the IEP meeting when the family and school attempt to come together to design a child's education. This meeting is a crucial moment in determining whether a child receives the appropriate educational services and thus is a critical point of policy implementation. Families and educators will need to engage in these difficult conversations.

School systems, also referred to as local education agencies, are often quite large. For example, in New York City, there are more than 1,000 schools within a single district supporting 1.1 million children and their families. For families in large metropolitan areas, working individually with a school can create difficulties in establishing a 'relationship' with that school. Families of children with an IEP often feel overwhelmed by the enormity of the enterprise into which they have entered the web of special education services. Support families have different experiences. Families with expansive social networks and higher levels of education appeared much more comfortable in asserting their rights and the rights of their children. However, even these more resource-rich families found the system intimidating and unwelcoming and described personnel who were not particularly trustworthy (Chopp, 2012).

For some families, the IEP process was an unrealized promise that began with high hopes but which devolved into something fraught and adversarial. Despite their challenges navigating the

process, families clearly articulated a vision for success in IEP meetings. Salient issues included wanting equitable access to the educational program for the child, clarity of educational decision-making, and a collaborative rather than adversarial approach. Families also sought a more humane meeting atmosphere, where people actually knew and cared about their regular education teacher and strategized how to include the child in the classroom rather than merely discussion services offered apart from the classroom (King et al., 2017).

Accommodations and Modifications

In recent years, Individualized Education Programs (IEPs) have gained recognition as an important part of the education process for students with disabilities. Though the IEP is designed to ensure that children with disabilities have appropriate opportunities in public schools, there is frequently a gap between the intent of the IEP and the actual practice of inclusive education (D. Williamson, 2011). Underutilized accommodations and modifications are often cited as a key reason behind this gap, pushing researchers to better understand these instructional strategies and the IEP process. As part of a larger study that examined teachers' attitudes toward IEPs, including accommodations and modifications within IEPs for students with disabilities was specifically examined.

The two terms, accommodations and modifications, often surface in discussions of instruction for students with disabilities. Understanding the difference between accommodations and modifications is critical to maintaining the spirit of the federal legislation regarding IEPs and the Least Restrictive Environment (LRE) (Joel Morris, 2012). Accommodations are practices and procedures that provide equitable instructional and assessment access to the general education curriculum for students with disabilities and English language learners (ELLs). Accommodations are intended to assist in removing educational barriers while maintaining the integrity of the curriculum, minding that students are acquiring the same knowledge and skills in a different way. Modifications involve changing, lowering, or reducing learning or assessment expectations in such a way that students are retaining access to the general education curriculum but are being taught and assessed on a different set of knowledge and skills. Modifications are meant to adjust the amount or complexity of content, therefore deliberately impairing the curriculum. The duality of accommodations and modifications present a challenge to teachers of students who need adjustments to access instruction.

The IEP Development Process

Parents of students with disabilities are assured with certain rights under IDEA (A. Rosenbaum, 2001). These rights include notice of the individualized planning meeting must be sent by certified mail, at least five days in advance of the meeting, and to attend and invite other individuals with knowledge and expertise to the meeting, either personally or in writing. Notice must include the date and time of the meeting, who will be in attendance, purpose of the meeting, and the right to request an alternative meeting time. Parents have the right to review a child's records, including those of any prior educational placements and to request an independent evaluation of these records. This request must be made in writing, and the evaluator must be independent of the school district. Parents also have the right to receive notice of, and attend, any change of placement for their child, at least five days in advance of the new placement's effective date.

Finally, in the event of disagreement about a proposed change of placement or service, parents may withhold approval of these changes, after which they are entitled to mediation and/or an impartial due process hearing before a decision by an administrative law judge (Gorin et al. 2024). The IEP must contain a statement of the child's present levels of performance in academic and other areas of functioning, a statement of specific educational needs, a statement of specific

annual educational objectives or goals including performance criteria and evaluation procedures, a statement of specific methodologies and the responsible staff for meeting the goals, and educational placement in the least restrictive environment. This process includes everything from the team deliberating and drafting the IEP to its implementation by school personnel and specialists and to its ongoing assessment and revision and redrafting by safe-guards or complaints by parents, through a variety of means.

Role of the IEP Team

The Individuals with Disabilities Education Act (IDEA) requires that students with applicable disabilities participate in a free and suitable, public education. These disabilities may include conditions such as autism spectrum disorder, attention-deficit/hyperactivity disorder (ADHD), emotional disturbance, mental retardation, specific learning disabilities, and traumatic brain injury. If needed, students receive special education services. A team of school personnel, parents, and sometimes the student collaborate to determine special education eligibility and the services a student receives through an Individualized Education Plan (IEP). Generally, people view the roles and responsibilities of the IEP team members as delineated in policy, but research reveals significant inconsistencies across the IEP process. The findings are framed through the categories of context, content, and outcomes. When individual families and school personnel communicate positively and students access appropriate special education services, they can have beneficial educational outcomes and long-lasting benefits afterward (King et al., 2017). Unfortunately, the vast majority of research confirms that systemic and individual barriers hinder promising partnerships between schools and families in the IEP process.

Lack of understanding or knowledge of the IEP process initially kept many families from participating in meaningful ways. The IEP is an intricate, complicated, and demanding document that families, particularly those from community groups who are in the student's school of attendance for the first time, typically lack experience in navigating. Even parents who feel confident advocating for their child in other contexts felt less confident speaking up in an IEP meeting. Once in an IEP meeting, many families noted that the professional jargon and education-related discussions excluded at least one or two family members from participating meaningfully (Mislán et al., 2010). Other people reported serving as a translator, making it difficult for the family member to take an active role in the discussion. Frequent school officials, particularly related services providers, often discussed assessments and data that seemed irrelevant to what the family and parent necessary. Thus, at least some individual families had experiences that correlate with the systemic barriers between schools and families in the IEP process.

Parent and Student Participation

Effective planning for the educational program of a student receiving special education services requires the participation of the parents. Thus, the process to develop each child's IEP involves many efforts by the school district to ensure that the parents are informed and invited participants, and any undue delays in holding the meeting would constitute a violation of a substantive right. However, due to communication challenges during the early years, the child's eligibility for services may not be apparent until it is too late. Public agencies must be diligent in making long-range plans for the education of such children. Initially, the school districts may have little information about the child or parents, and early intervention services are usually provided through a state agency appointed by parents. This makes it difficult for the school district to plan an appropriate transition and develop a specialized Individualized Education Program (IEP) after the child turns three and enters preschool. Parental notification and meeting invitations arrive when the child has already developed significant habits, and the parent is left to wonder how

much care the public school has taken to understand the child in the three months leading up to the transition (A. Rosenbaum, 2001).

Parents who have furthered school contacts may remove their children from the school with little consideration for existing or future relationships. If the IEP team includes professionals with whom the child is comfortable, there is a better chance for cooperation, and tribulations with powerful school members may be reduced or ameliorated (Şenay İlik & Konuk Er, 2019).

On the other side, increasingly fewer parents will select private placement if the public school is responsive to the parental wishes. The child cares only about the people in the school, and establishing early relationships can ease the tensions attending starting at a new school. If the new school could either employ most of the same professionals or assure the parents that similar professionals would be employed, the transition might be smoother. The incoming staff could have exposure to tapes or reports showing the child's functionality and illustrating existing strategies to handle outbursts.

Drafting and Reviewing the IEP

Drafting and reviewing the Child's Individualized Education Program (IEP) is a collaborative process that involves team members. Depending on the recipient settings, the way of school-level and department-level participation may differ. Under the leadership of school principals, the leaders of departments and teachers of basic subjects design collective IEPs in an integrated-regular educational environment. Academically supporting departments reinforce individual IEPs based on the collective ones. Special schools, on the other hand, draw up individualized IEP recommendations to serve students through home-based services, special classes, or profound-level special schools (Şenay İlik & Konuk Er, 2019). Important roles are performed by regulating, enforcing, and overseeing cooperation in teams. At this point, child welfare state professionals assist principals and family members in collaboration, and they attempt to foster a collaborative culture at the child, family, and school point (King et al., 2017).

IEPs explain in writing how children with disabilities who are receiving special education services will transition into general education. An Individualized Education Program (IEP) is a written plan to help students with disabilities get the education they need to succeed in school. All students receiving special education services must have an IEP. Services for students with disabilities must be listed in writing. IEPs must be reviewed every year by a team of educators, parents, and, when appropriate, the student. The IEP must include information about how the child has progressed over the school year, what the child will work on in the coming year, and how the school will help the child achieve his or her goals. If the child is not making sufficient progress toward an IEP goal, the team must determine whether the goal is appropriate, whether the child is receiving the specialized instruction and related services required by the IEP, and whether improvements need to be made in the IEP.

Students, as well as parents, should be participants in the IEP meeting. The transition from special education services to postsecondary bilities must be reviewed. The IEP must be reviewed annually by the IEP team to assess the child's progress toward IEP goals. IEP meetings may be requested at any time during the year. IEP progress notes must be sent home at least once a year. The IEP designation must be reviewed at least once every three years.

Implementation of IEPs

An IEP is a written statement that outlines a student's learning needs, instructional goals, and services. The IEP is developed by a group of individuals, as part of a team, and annually reviewed by the same team as part of ongoing collaboration with families, educators, and service providers (King et al., 2017). The law protects students from being excluded inappropriately from IEP

services. The law specifies how students qualify for services. An IEP outlines what services must be provided and plans how progress will be measured and evaluated.

The IEP is unequivocally the most important product of the IEP process. This document has sustained the longest scrutiny and is underpinned by law in many countries (John Gregory, 2014). The individual education planning (IEP) process is seen as the keystone of effective special education, the foundation from which schools operate special education programs, and the mechanism through which schools manage the delivery of educational services to students with disabilities. Writing and reviewing an IEP is seen as primary in ensuring appropriate educational provision. It is also to be viewed as an accountability tool, a mechanism through which the system, school principals, and teachers account for their special educational provision and practices. The IEP process is seen as a means of developing and maintaining collaborative partnerships amongst all those with an interest in the education of a student with a disability. It is viewed as paramount in effecting positive student outcomes and for student empowerment, independence, agency, and self-determination.

There is a voluminous literature on the IEP process spanning four decades. It is the most heavily scrutinized special education process, product, mechanism, and tool. Critiques of the IEP process abound, with commentary on the role, nature, content, purpose, use, and efficacy of educational planning meetings, planning documents, and all components within this process. Two overall themes emerge from this scrutiny. The first theme is characterized by a critique of a deficit perspective underpinning IEPs, the over-emphasis on the individual, and a general lack of reference to wider systemic factors. Unfortunately, whatever the critique directed at the non-compliance or inadequacy of completed educational plans, it remains the case that the IEP process is a legislatively determined requirement for all special education systems and schools across the globe.

Challenges in IEP Implementation

There exists a consensus about the importance of special education services to provide students with disabilities with a free appropriate public education in the least restrictive environment. Documenting and articulating these services is often accomplished through the development of an individualized education program (IEP), a legal document that is intended to ensure appropriate educational services for students with disabilities. Despite this consensus about the importance of the IEP process and the legal requirements imposed upon school districts by state and federal laws, there continues to be a lack of implementation of the IEP process. Even if civil rights were not an issue, a primary gap in effective implementation of the IEP process is noncompliance with important elements of the IEP and poor understanding of these provisions. This widespread lack of compliance is most severe for a number of provisions that are key to preventing more chronic difficulties in the educational attainment of students with or at risk for social, emotional, and behavioral challenges (John Gregory, 2014).

Despite research showing the effectiveness of well articulated special education services in preventing and attenuating more chronic learning and behavior problems, reports continue to show that there is a gap between the potential and actual implementation of these provisions. Cross-sections of research studies show that many of the original guidelines spelling out the services available to families and their children within the schools and community continue to go, for the most part, unnoticed or misunderstood by parents, teachers, and school administrators. To protect families and children from these more chronic learning or behavior problems, IDEA was constructed to ensure that public agencies would implement the law on behalf of students and their families. Numerous research studies have been conducted to analyze the implementation failures of the IEP process and related services (Rashid and

Wong2023). The resulting gap between the declared services, as articulated in part B of IDEA and elsewhere, and the actual services received continues to grow despite and in part due to the best efforts of multiple constituencies who support implementation of the IEP process and related services.

If IDEA and many of the principles espoused in it, primarily the right to an education, protections against bias and discrimination, and due process and confidentiality provisions were to be eliminated entirely, the educational lives of students with disabilities in the U.S. would likely not be measurably different than they are now. In a free market where all educational services were privatized, families of children with disabilities could elect to receive services outside the bounds of or in a less structured and legalistic manner than is presently required. In the absence of IDEA, this might mean individualized tutoring services, independent schools, or the like. Yet, once families, collection of disabled children, or both were able to eavesdrop on the abilities of comparable children, it is likely that massive public outrage, not to mention litigation, would occur even without the framework of IDEA. In societies, states, or countries where public schools are completely absent or a smaller part of the educational delivery system, children with disabilities and their families still suffer from neglect and abuse.

Resource Limitations

Gifted kids or those whose talents are in the musical or artistic realm also are affected by unsuitable IEPs. Even when these IEPs are appropriate, educators do not receive proper training, time, or financial resources to implement them. Many schools developed whole language programs or collaborative-teaching settings for lower-grade inclusion that presented major transition problems in middle school, and IEPs were ignored because teachers were not appropriately trained, were overwhelmed, and were resistant. The inertia and stagnation generally characteristic of secondary schools were exasperated by a chaotic, unplanned transition that derailed all efforts to make inclusion successful (Saaybe, 1996). Federal policies to enact secondary schools dropped out students' rights under IEPs, making their learning opportunities unequal to those of their peers. All students, including the gifted, continue to have to take standardized tests despite unsatisfactory and inappropriate educational experiences.

Individually Designed Education Plans (IDEPs) or Contracted Education Plans (CEPs), like IEPs, provide an educational experience designed to meet the unique needs of a student with disabilities. A current definition of giftedness could delineate this population as those children who were unable to meet the eligibility criteria found in the federal or state definitions. While special education funding benefits a number of gifted children, those with disabilities not addressed by the restrictions of conventional special education programs slip through the cracks in the educational system (Wong and Rashid2022). Educators and state lawmakers have resisted attempts to address these needs. School districts assert that gifted students have no right to services paid for by outside entities. Many school districts do not have programs at all but instead offer a list of off-site opportunities at the expense of parents. In many districts, gifted students are ignored or subject to IEPs that restrict them to math and reading unless they fall well below grade level in these subjects. This inequity is compounded by special education variation among states. Few gifted children's parents even know they have educational rights, what these are, or, to date, how to enforce them.

Training and Support for Educators

IEPs are rooted in federal mandates for students with disabilities. State governments determine how IEP regulations are implemented. Local education agencies effectiveness in meeting student IEPs is tracked through state assessments and are held accountable if they fall short, including possible non-consideration of state funds. Student outcomes are tied to teachers who are

evaluated based on growing student skills. Poor teaching evaluations impact job security, and teachers face immense pressure to comply with the IEP policy or pathology to ensure student success. A lack of understanding about the process may preclude the rights of students to a well-crafted IEP.

Educators receive training through various means; however, the training tends to focus on how to write the IEP and makes the assumption that more training leads to better implementation. The skills needed to compose IEPs are not closely aligned with the pedagogy necessary to actually provide specialized instruction or related services. Teachers and service providers may be trained extensively in either area but lacking in having both skillsets. Relatedly, educators often desire additional training in how to meet the needs of students on their caseloads because, in many cases, teachers have not been trained in the specifics of how to deliver specialized instruction. Teachers serve IEPs generated from special education departments in their district but in many cases have not been trained in what steps they need to take in order to implement IEPs (King et al., 2017).

Teacher satisfaction with training received in understanding parent concerns during the IEP process and proactively building relationships with families appears low across all teacher demographics. A thorough understanding of family concerns and how to help families feel welcomed and a valued participant in IEP meetings is a professional pursuit that teachers agree needs additional training. When teachers know more about family concerns and how to proactively help families feel welcomed to working with a teacher their confidence grows in furthering parent-teacher collaboration during meetings. Teachers waver in the IEP process at the number of parent concerns to be discussed and that the parent-teacher relationship is valued in the meeting (A. Cheatham et al., 2013).

Communication Barriers with Families

When forming an IEP team, strong communication with families is paramount. Students who graduate with more extensive skills and knowledge have most often been guided by strong family advocates. Children with disabilities who are not adequately supported at home are unlikely to have a successful educational experience. Families are experts by experience and provide valuable input on their children's unique skill set. However, families of students with disabilities have unique challenges regarding communication with schools (A. Cheatham et al., 2013). Both internal and external barriers are vital to understand when determining how to strengthen communication. Families may not realize they are members of the IEP team or what that entails. Schools frequently report limited availability and involvement of families and sometimes dismiss families' role in their children's education. Parents report limited access to information about schooling and perceive school personnel as rude or blaming. At the intersection of these barriers, many families feel isolated and powerless. Moreover, these challenges are more pronounced for families of culturally and linguistically diverse students. It is critical to keep these barriers in mind when assessing the understanding and participation of families. Families often learn about the special education process as they go along, after it has already started.

On the one hand, schools are careful to involve parents actively, explain rights, and reduce complexity. On the other hand, the complexity of special education/IEPs and the lopsided power dynamic prevent full understanding and involvement, particularly for families without support or prior positive experiences. Such extra communication and reassurance are reassuring to families. However, it may also help reduce anger or suspicion regarding an IEP team's knowledge or interpretation of SPED policy or law. In addition, families of culturally and linguistically diverse students may need altered or more extensive communication due to time constraints, complex dialects, culturally specific communications, or passive communication styles.

Assessment and Evaluation of IEP Effectiveness

The Individualized Education Program (IEP) process, as a central obligation under the Individuals with Disabilities Education Act (IDEA), has been recognized as sophisticated and multi-faceted, comprising 'conceptual and procedural complexities', according to (King et al., 2017). However, the contested nature of IEPs is clearly evident in the literature. The introduction of such tools is widely regarded as insufficient, insufficient training is provided in their conceptualization. The IEP process is documented as disjointed and seldom used functionally, rather as an administrative 'tick-box' exercise to fully meet the accountability agenda laid down in the legislation. Positioning all of this against a backdrop of 'expert' IEPs and necessary guidance is vital, given the fraught nature of the task coupled with the broad expectations placed upon those charged with this responsibility. It is a high-stakes endeavor, as the IEP throws into vivid relief the entire relationship between the student, family, school, and educational authorities.

A major focus of the review team was the manner in which IEP goals were identified, reviewed, and measured. The research found a broad continuum of varying practice in planning and documenting IEPs across the schools visited until the entry of a dedicated support service. All schools had documented IEPs for students with disabilities, though the level of detail and specificity varied considerably. Notably, the IEPs presented to the team often had only the broadest and least measurable goals. In schools where the supports were absent, the review team saw IEPs that essentially devolved to management annotations similar to an Attendance and Participation Plan. Students were successfully included in schooling but without meaningful engagement with the curriculum and a recorded lack of observable goals. This finding suggests a need for quality assurance processes applicable to schooling for students with disabilities to retract their inclusion. All of the reviewing frameworks examined guidelines around the expectation for teachers to transfer 'whole of school' policies into 'personal' action plans. (Pounds & Dr. Cuevas, 2019) Such individual planning is considered essential for translating generic guidance around quality teaching and learning into specific accommodations. The reviewing frameworks invariably demand the assessment of teachers' effectiveness in meeting students' needs.

Data Collection Methods

Phase 1 of data collection includes two methods: parent and teacher questionnaires and teacher interviews. In order to collect information about IEP meetings and procedural safeguards, the survey form developed by (Şenay İlik & Konuk Er, 2019) is used and a total of 19 close-ended options and open-ended questions are asked. While some questions are created by taking into account the suggestions in the literature regarding both teacher- and parent-related variables, some questions are directly adapted to Turkish from. The survey items prepared in Chinese are translated into Turkish, then back-translated into Chinese by an expert who is fluent in both languages. The reverse-translated survey is compared with the original survey to guarantee its reliability. In addition, 8 questions intended to discover teachers' opinions about IEP, parental involvements in the process, and possible problems encountered in inclusive education are asked.

Phase 2 of data collection includes producing, coding, and analyzing video-recorded data. The first data set is 25 video-recorded IEP meetings. Each video is approximately 30-70 minutes long. The effectiveness of the IEP meetings is evaluated by coding the selected videos regarding the participation and involvement of parents and educators. Therefore, the number of parents' and teachers' verbal contributions is determined. After familiarizing herself with the videos, the first researcher watches the videos again and codes them according to the observation guidelines developed by. Then, both researchers watch the videos and discuss any inconsistencies in their

coding. When differences arise, it is returned to the videos until they reach a consensus in coding. Finally, the video database is produced (Quinonez, 2023). During the final viewing of the videos, their main focus was on teacher effectiveness. This analysis is carried out by both researchers to achieve reliability. Then, the first researcher analyzes the video, and in cases where the coding lacks clarity or conflicts arise, she turns to data sources to reach a consensus. After both phases of the analysis, a quantitative content analysis is conducted to examine how different data sources interact with teachers' and parents' behaviors.

Evaluating Student Outcomes

The IEP process is challenged to demonstrate student outcomes. Accountability initiatives from government bodies within 'high stakes' environments are impacting on how students are assessed in schools and how schools are held accountable for student progress and school performance. Following the commencement of special education reform, research in the ROI highlighted that student outcomes were not routinely documented in IEPs, nor were there processes to review or evaluate student outcomes. The literature highlights the importance of assessment in the implementation of IEPs. Hoban clearly differentiates between assessment, assessment for learning, assessment of learning and accountability and stresses that a clear understanding of these terms is essential for effective practice. Assessment of learning is widely regarded as summative assessment or a 'snapshot' of a student's progress taken at a point in time.

In the ROI the majority of schools participating in the recent SNAs study had IEPs with 'outcomes' but these were not specific to assess student progress. It is argued that IEPs could be considered a 'working document' that inform targeted classroom instruction or learning outcomes to be achieved in a timed manner through specific interventions. IEPs as accountability documents are analysed and characterised by child studies which report assessment data but may not directly relate to student progress or be linked directly to IEP goals (King et al., 2017). It is suggested that this is a deliberate strategy to present student achievement and ensure that schools are seen as compliant. There is a growing body of literature on measuring the implementation of IEPs and the use of audits and qualitative studies (C. Haines, 1986). Self-/external reviews of academic, social and emotional, and curricular participation are suggested with accompanying rubrics. A study which measured the impact of specific intervention goals, number of goals in general education and study and attendance, indicated that in particular system-wide intervention goals conferred benefit and all students benefitted from programming adjustments.

Trends in IEP Policy and Practice

Students with disabilities are entitled to individualized education programs (IEPs), designed to meet their unique needs through specialized instruction, accommodations, and related services. Each IEP must specify measurable annual goals and the school personnel responsible for implementing these services. IEPs are legal documents developed collaboratively to address special educational needs and are required for students eligible for special education. The importance of IEPs is emphasized both nationally and internationally, as they facilitate a child's success in receiving education in the least restrictive environment (Akçin, 2022). A well-written IEP supports students in achieving educational goals and clarifies the roles of school staff. It should outline a student's current performance, annual goals, and necessary accommodations and modifications. Evaluating IEP policies is critical to assess their effectiveness and identify areas for improvement. Understanding these policies helps education agencies identify where development and implementation need attention, enhancing the assessment of students' complex school experiences. An evaluation of IEP practices can measure the education system's accountability and compliance with students' rights. This approach aligns with the spirit of IEP

laws, recognizing the educational rights of students with disabilities and their practical implications.

Inclusion and Mainstreaming

The focus of discussion is on inclusion and how, given the many differences, their presence in the same setting can be beneficial for communication and social skills and be viewed as inclusion (Stanfield & of Lethbridge. Faculty of Education, 1999). Those pushing for inclusion apply a narrowly-defined understanding of the term and there is a growing challenge and questioning of the concept that is likely to grow as full inclusion practices abound. This is not to say that children with disabilities should be placed in some segregated location, as this tends to be more damaging than the apparent social logic of having different emotional or behavioral needs and being separated from the wider community can suggest. Children are all different. Problems may arise because people know they are different and setting the example of treatment behavior towards children that cannot obey rules and boundaries tends to perpetuate acceptance of the behavior. This is clearly not the goal of education, which is to create sustainable and acceptable change in one's behavior.

For those concerned with seeing a good education equated with a good dose of socialization, debate can be entered. Some see that moving a child with disabilities to a neighborhood school is a possibility as the particular context may be acceptable in terms of meeting their specific needs, or even as an acceptable means of progressing through the stages of child development and preventing further problems later on. There is a wide spectrum of treatments or forks in the road for children with physical and social disabilities, and helping the person to find a better social fit is often possible. Full inclusion would be very difficult in actuality, as not all people subscribe to socially acceptable behavior. Classifying aggressively antisocial behavior as a disability may be beneficial to both parties as expensive and intensive analysis is indeed suffering. Implementation of an entirely mainstream model would preclude the frightening aspect of knowing the unmedicated view of the world via non-prescriptive classes.

Communicating ideals of full inclusion can be damaging rhetoric, for if learning support is to take place best in "isolated" settings that prepare the child for routine, looking back on such treatment tends toward distaste and lies at the heart of their eating disorder or anger. It is not a problem of education, if a person could see via exclusion better away from the chaos of general education or in with the low on the intelligence spectrum. At risk is their choice for beliefs or pathways of social thought leading either further into the odd or ideologically banished, as the avenue of free expression is scorned. Models of ideal organizations developed around the behavior may perpetuate exclusion as the ideal, turning drama therapy into a vehicle of possible feeding and social insight.

Technology in Special Education

As the Internet and other technological advances permeate our lives, the world of education is impacted. COVID-19 has forced educators of all grades and types into a virtual world, giving rise to many questions. Easiest answers come first: How can regular education students handle lessons via Zoom? How do teacher's best connect with a disembodied audience? What does one plan for lesson instruction while staring into a computer screen? How can a teacher assess what the student has (or has not) done? Staring into the virtual black holes of gifted education, mainstream education, or general education raises many questions. Questions multiply exponentially in special education. If a student with a learning disability refuses to attend a virtual lesson, how can the school best find that student's missing piece? Technology addresses some of the ailments; however, there are many unwanted side effects.

Technology in special education covers everything from word processors to calculators to reading pens. Educational needs arise in many forms. Enhanced scope and quality of organizational technology increases the chances of success for students with disabilities. Technology in special education is a growing field of study. Assistive technology may help students with disabilities organize, comprehend, and produce information by immersing them in programs that offer time savings and engagement. Access to information technology can help students level the playing field; however, transformation and use must come from the individual. True change may require more extensive teacher education and training than a one-day workshop allows (Niego-Saltzman, 2000)).

Assistive technology encompasses all devices and services that assist children with disabilities in accomplishing tasks more easily, accurately, and independently. These technologies benefit similarly and uniquely. Technology solutions, directed at reading disabilities and/or at learning disabilities, leverage an improvement process based on levels of need, mediating the knowledge of previous technicians. For reading disabilities, THERAPY makes suggestive recommendations about adequate technology; specificity and accuracy are at a higher level than they are for enough effective technology. Level of need significantly shapes technology adoption: high-level technology users choose simpler equipment and software. Increasing equipment, technology, training, and efficiency has significantly affected the curve on which needs respond to technology (A. Hanes, 1998).

Future Directions for IEPs

The IEP is undoubtedly a well-established educational policy, with roots extending over four decades. Most of the nation's school boards have developed an institutionalised due process for identifying exceptional students and formulating plans to meet their educational needs. It is seen by many, including an overwhelming majority of researchers across a variety of disciplines, as a legally enforceable document which transforms a plan of action into a prescribed set of services for the student in question, monitored through periodic review and evaluation (A. Rosenbaum, 2001). The procedural safeguards built around the IEP and the provisions for transition planning from school to adult functioning have, to a large extent, empowered parents on behalf of their children and young adults with disabilities. Whether they have achieved empowerment or hindered genuine collaboration is an important question to address moving into the future.

The world of education is undergoing significant change, and the IEP process will need to adapt to this changing milieu. Schools will need to embrace innovative approaches to teaching that leverage the power of new technology, encouraging students to thrive in a complex world of knowledge, creativity, communication, complex adaptive systems, and collaboration. How can the IEP process embrace these challenges? The increasing emphasis on local autonomy and parental choice brings with it the possibility of school boards developing IEP policies which offer a vastly different and possibly inferior process than the one in place in their neighbouring districts. How can the equity of the process be assured in all school boards? The drive to standardise curriculum and assessment in education runs counter to the IEP policy's philosophy of individualized educational planning (Marino, et al.2023). Given that the establishment of more inclusive schools has been debated by researchers for at least a decade, what is the future for Policies like the IEP which refuse to acknowledge and seek solutions to this underlying theoretical contradiction?

Each of the questions posed earlier begs both empirical and normative responses. The IEP process is a complex and dynamic phenomenon driven by an intricate interplay of social contextual and historical variables. Much legitimate research has explored the dynamics and complexities of the IEP process over time. The desirability of fostering inclusive schools is a widely

shared opinion across research circles, as is the opinion that the current IEP process falls short in this regard. Addressing the question of how to best propel the IEP process itself towards this end may be where progress can be made, rather than attempting to find a set of answers that will be equally applicable in all jurisdictions.

Personalization and Flexibility

The majority of students in special education sit in 80% or more mainstream classrooms with typically developing peers. Approximately 7 million students aged 3 to 21 receive special education services under the Individuals with Disabilities Education Act (Schwartz, et al.2021). It appears from federally reported data that most students with disabilities are educated in mainstream settings, spending 80% or more of their school day in general education classrooms. The challenge for educators is to create personalized plans so that all students achieve meaningful and lasting progress. At a policy level, the challenge is to create a shared vision, a clear agenda, mechanisms, and incentives at multiple levels of the education system.

There is growing pressure for schools to personalize education, and the criteria for quality individual personalized education programs go beyond the requirements found in federal legislation. Policies at multiple levels do not adequately translate knowledge to schools. But states and other authorities have initiated new policies to create the conditions for better outcomes from individualized educational programs. Some schools are implementing comprehensive and whole-child approaches to improving individualized education programs (Bhutoria, 2022). Time and leaders are major constraints to making overall improvement. It is important for schools to strengthen their partnerships with community-based organizations to address the challenge of time. To find and develop leaders, schools need to benefit from mechanisms such as practitioners' networks; effective recruitment, including incentives for enticing active practitioners; and a deep understanding of personal motivation. Education systems need to use multiple strategies and instruments synergistically to make leverage.

Few previous studies of education directed primarily at policymakers have addressed the topic of 'personalized education.' Of the two that addressed the topic extensively, one is a report on technological personalization of instruction for better learning outcomes in schools. It reviews developments in the personalizing of instruction interventions in contemporary schools and their impact on learning achievements and equity, and offers recommendations on using information and communication technology to personalize instruction and policy support measures. In a task force report, the other begins with a focus on educational technology and warns against adopting narrow and deterministic technology for educational personalization, that the widespread unequal access to digital technology exacerbates inequality of opportunity in education, and that public policy should be directed to ensure equitable access to technological tools and software.

Policy Recommendations

The federal regulation of the Individuals with Disabilities Education Act (IDEA) requires that there be, in writing, a detailed plan and procedures under which students with disabilities, ages 3 to 21, must be educated. The IEP specifies such educational plans, programs, and services, and is a collaborative product of parents and professionals. It requires educational programs and services appropriate to the evaluated needs of the student, and is generally considered a vehicle of quality control over the special education delivery system (A. Rosenbaum, 2001). In a sense the IEP wields statutory authority equal to special education law itself, as it is the mechanism through which the greater portion of the law is translated into action. The IEP contains a broad array of substantive and procedural protections to ensure that the basic rights of students with disabilities are honored (King et al., 2017). In advocacy terms, it is a powerful instrument and weapon.

However, generating an IEP may always be less than straightforward. Detailed provisions and requirements can be expected to be routine and formulaic as part of due process for a huge government-funded enterprise. But for the less systemic and prescriptive matter of education, the hard work, muscle, sweat and tears that must go into pragmatically educational, mainstream useable, and reasoned human activity will inherently resist over-specification or legal checklists. As the phrase “reasonably calculated” suggests, flexible time and resources will be required to figure out educational programs for the individual student (Valtonen et al.2021). Given the complexity of this task, however, greater recognition should be given to the failure of the elaboration of procedures at the federal level to really offer much help. Instead the regulations appear to be both unreasonable and incomprehensible. Solutions are elusive, as are those students in school systems, and efforts to increase awareness of these matters is an uphill if not quixotic battle.

Greater emphasis should be placed on legislative solutions to balance the criticisms of the implementation by greater understanding on the part of parents and other advocates. Guidance should be developed to enhance awareness on the part of parents of the IEP content bracing knowledge of norms and feared violations, and of the pros and cons of implementation request and denial. Realistic panoply of adolescents should help validate parental fears and criticisms. Many have expressed anxieties need for parental understanding and engagement specifically with regard to policies regulating the implementation and consent to changes in IEPs.

Conclusion

Despite changes to current policies in relation to assessment paradigms and the learning goals for students with disabilities, IEP documentation, content and processes continue to reflect an outdated policy framework that fails to deliver equity of opportunity and participation for students in education systems, communities and society at large. The role of federal and state jurisdictions in regulating standard practices of IEP documentation and processes must be updated to reflect contemporary research and understanding of effective practice with respect to inclusive education for students with disabilities. It is clear from the lack of rigorous, contemporary, Australian research on IEPs that more than just a policy review is needed to ensure Australia is able to meet its international obligations regarding the education of students with disabilities.

Accountability mechanisms and consequences for jurisdictions who fail to comply with international obligations must be investigated and implemented. Cross-agency implementation of national standards and protocols for the IEP documentation and processes, responsive to large regional and functional variation, is not only needed in Australia, but was also identified as a pertinent issue across much of the Asia-Pacific region. Mechanisms for effective sharing and repurposing of locally sourced information and resources to support proactive action on the part of agencies at all levels should be investigated. Service providers have traditionally contended that the reliance on documentation reflects an accountability mindset imposed upon them by funding bodies, with many willing to adopt a more proactively supportive stance with respect to IEP implementation if accountability requirements were lessened. All agencies must find better ways of influencing and enacting inclusive practices with schools, including IEP processes, than acting only as distant observers and reviewers of documents. The lack of reference to the contemporary disability paradigm and educational policy environment in IEP documentation or processes puts priorities for education, educational goals, and reporting on achievement of goals at risk of being influenced by an outdated paradigm.

Policy mechanisms should be developed to ensure and safeguard the alignment of IEP policy, process, and documentation with well-founded contemporary theory and research on effective

practice to promote equity of opportunity and participation in learning and education. As policy instruments, IEPs embody contemporary understandings of the nature of human diversity and disability, function, knowledge, participation in education systems, and the experience of belonging to communities, which operates differently in preschool, school and post-compulsory education settings. Relentless out-of-home placement in first, second and third world contexts conditioned by a functional deficit paradigm must be challenged. Future research must seek to unearth and scrutinize the social constructions of disability that underpin long established patterns of educational exclusion. Early shut doors and adoption of a zero tolerance regulatory stance for disorder types must be studied in order to develop and advocate alternative constructed realities that promote inquiry into the etiology of disorder types as opposed to stridently separating peoples. This shift in commitment must be imbued with agency responsibility for constructive practices, as opposed to a passive and distant observational role.

References:

- Akçin, F. N. (2022). Identification of the processes of preparing individualized education programs (IEP) by special education teachers, and of problems encountered therein. *Educational Research and Reviews*. <https://ed.gov>
- Alqafari, S. (2016). *Mind the gap: Examination of elementary students' individual education program goals*.
- Bailey, T. R., & Weingarten, Z. (2022). *Strategies for setting high-quality academic individualized education program goals* (Version 2). National Center on Intensive Intervention. <https://ed.gov>
- Bhutoria, A. (2022). Personalized education and artificial intelligence in the United States, China, and India: A systematic review using a human-in-the-loop model. *Computers and Education: Artificial Intelligence*. <https://doi.org/...>
- Cheatham, G. A., Hart, J. E., Malian, I., & McDonald, J. (2013). *Six things to never say or hear during an IEP meeting: Educators as advocates for families*.
- Chopp, D. (2012). *School districts and families under the IDEA: Collaborative in theory, adversarial in fact*.
- Dietz, L. (2021). *The impact of professional learning: Writing high-quality individualized education program (IEP) goals*.
- Gorin, S., Edwards, R., Gillies, V., & Vannier Ducasse, H. (2024). 'Seen' through records: Parents' access to children's social care records in an age of increasing datafication. *The British Journal of Social Work*, 54(1), 228–245. <https://oup.com>
- Haines, G. C. (1986). *Quality programming for learning-disabled students: A comparison of microcomputer-assisted IEPs, manual-assisted IEPs, and teacher-written IEPs*.
- Hanes, E. A. (1998). *Technological writing interventions for students with specific learning disabilities*.
- İlik, Ş. Ş., & Konuk Er, R. (2019). *Evaluating parent participation in individualized education programs by opinions of parents and teachers*.
- John Gregory, M. (2014). *A solution hiding in plain sight: Special education and better outcomes for students with social, emotional and behavioral challenges*.
- King, F., Ní Bhroin, Ó., & Prunty, A. (2017). *Professional learning and the individual education plan process: Implications for teacher educators*.
- Marino, M. T., Vasquez, E., Dieker, L., Basham, J., & Blackorby, J. (2023). The future of artificial intelligence in special education technology. *Journal of Special Education Technology*, 38(3), 404–416. <https://ed.gov>
- Mislan, N., Mohd Kosnin, A., Kee Jiar, Y., & Sumarni Shariffudin, R. (2010). *Teachers in action: Delivering individualized education plan*.

- Morris, J. Q. (2012). *A description of accommodations, modifications, and forms of assessments in middle schools that made adequate yearly progress in an urban county during 2010*.
- Niego-Saltzman, T. (2000). *Insight for today and tomorrow: The world of special education*.
- Pounds, L., & Cuevas, J. (2019). *Student involvement in IEPs*.
- Quinonez, K. S. (2023). *Meaningful participation in Individual Education Program (IEP) meetings: Understanding the students' perspective*.
- Rashid, S. M. M., & Wong, M. T. (2023). Challenges of implementing the individualized education plan (IEP) for special needs children with learning disabilities: Systematic literature review (SLR). *International Journal of Learning, Teaching and Educational Research*, 22(1), 15–34. <https://myres.net>
- Rosenbaum, S. (2001). *When it's not apparent: Some modest advice to parent advocates for students with disabilities*.
- Saaybe, D. (1996). *Does secondary educational programming as reflected in the IEP differ for students classified emotionally disturbed and those classified perceptually impaired?*
- Sanderson, K. A., & Rojas, A. J. (2023). Parent perspectives on student IEP involvement. *Journal of Research in Special Educational Needs*, 23(2), 90–99. <https://researchgate.net>
- Schwartz, A. E., Hopkins, B. G., & Stiefel, L. (2021). The effects of special education on the academic performance of students with learning disabilities. *Journal of Policy Analysis and Management*, 40(2), 480–520. <https://edworkingpapers.com>
- Stanfield, S., & University of Lethbridge. Faculty of Education. (1999). *Inclusion or confusion*.
- Toprak, F., & Çolak, A. (2024). IEP team members' experiences on the process of preparing individualized education program in a secondary school. *Journal of Theoretical Educational Science*. <https://dergipark.org.tr>
- Valtonen, T., Leppänen, U., Hyypiä, M., Kokko, A., Manninen, J., Vartiainen, H., ... & Hirsto, L. (2021). Learning environments preferred by university students: A shift toward informal and flexible learning environments. *Learning Environments Research*, 24, 371–388. <https://doi.org/...>
- Williamson, R. D. (2011). *Accommodation and curriculum modification for students with special needs: A study of teachers' attitudes*
- Wong, M. T., & Rashid, S. M. M. (2022). Challenges of special education teachers in implementation individual education plan (IEP) for students with learning disabilities (LD). *International Journal of Academic Research in Business and Social Sciences*, 12(11), 113–128. <https://researchgate.net>