

# Changing the Conversation & Actions Essential to Improve Children's Mental Health in Child Welfare



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You never change things by  
fighting the existing reality.

To change something, build a  
new system that makes the  
existing system obsolete.

-BUCKMINSTER FULLER

There is a crack in everything.

That's how the **light** gets in.

-LEONARD COHEN

A lit candle with a flame, symbolizing light and language. The candle is positioned vertically in the center of the frame, with a bright, yellow-orange flame at the top. The background is dark, making the candle and its flame stand out. The text is overlaid on the candle's flame.

And language is that light  
for children.

Epidemiology  
Communication  
Language  
Behavior  
School  
Mental Health  
Diagnostics  
Foster Children  
Juvenile Justice  
Preterm Birth  
Treatment  
Opportunities

# EPIDEMIOLOGICAL BASICS

## DISEASE

There are always **determinants** for the **disease** to occur.

Does not occur by chance and is not distributed at **random**.

Distribution is related to **patterns of determinants** that **provide clues** to identify solutions.

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The **ability to communicate** is fundamental to children's social, emotional, and cognitive development.



**Language** is the vehicle by which children communicate their needs and ideas, develop and maintain relationships, and solidify their understanding of essential concepts.



**Language Nutrition** feeds children neurologically, socially, and linguistically by using language that's rich in engagement, quality, quantity, and context.

# PREVALENCE

It is estimated that approximately **12%** of children have some form of language impairment **that impedes their cognitive and behavioral development.**

The role of language disorders as a “missing link” for children with behavioral problems has been considered only recently.

Snow, 2013

There is increasing evidence that the prevalence of speech, language, and communication deficits is high among children who experience social, emotional, and behavioral problems.

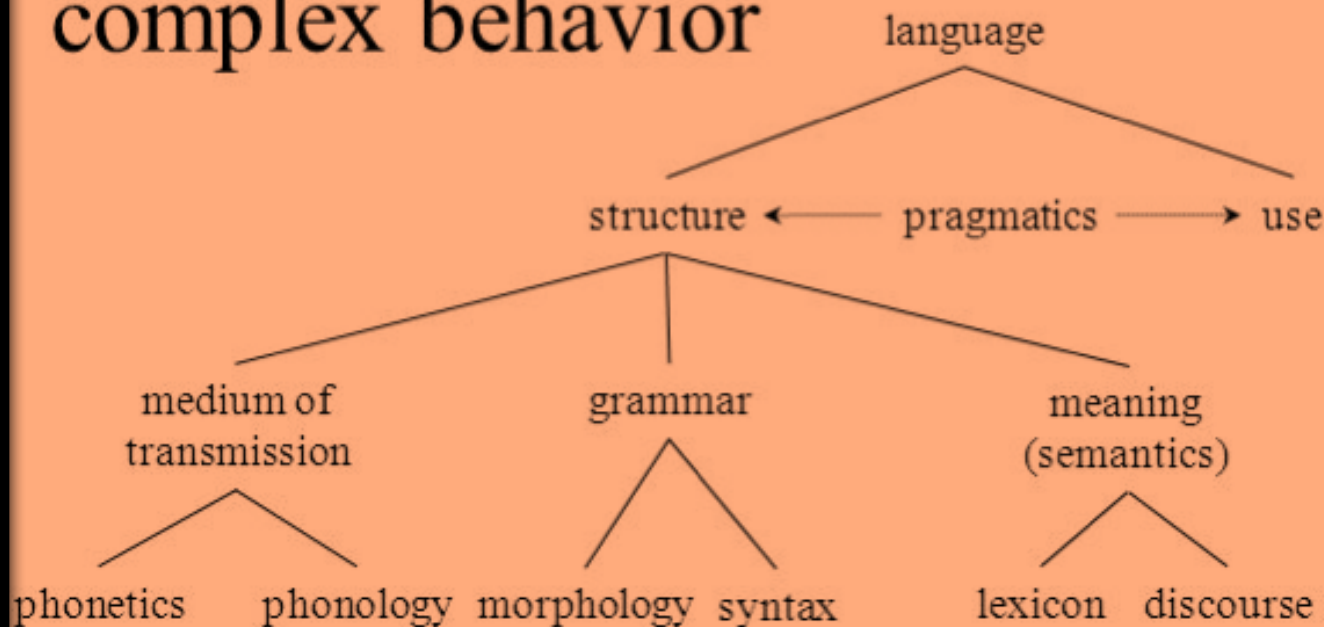
Van Daal, et al., 2007

# Complexity of Language

We have to be able to access our lexicon—our mental store of words, and organize these into meaningful sentences that convey our ideas.

**Simple? Unfortunately, no.**

Even though it feels simple to produce and understand language, it is a very complex behavior

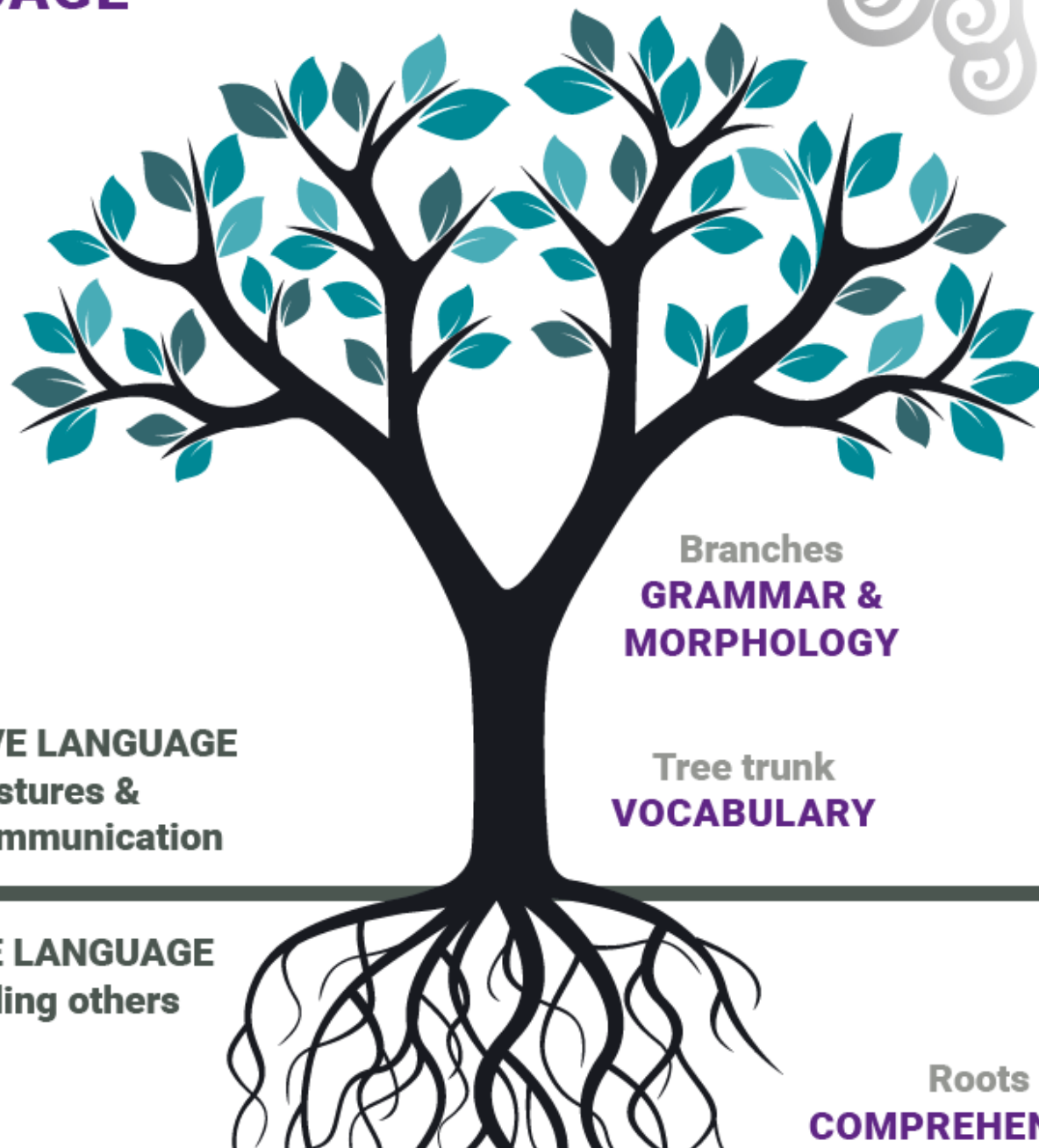


# Roots & branches

## THE GROWTH OF LANGUAGE



Air  
**SOCIAL  
CONTEXT**



Leaves  
**SPEECH  
SOUNDS**

Branches  
**GRAMMAR &  
MORPHOLOGY**

Tree trunk  
**VOCABULARY**

Roots  
**COMPREHENSION**



**EXPRESSIVE LANGUAGE**  
Speech, gestures &  
outward communication

**RECEPTIVE LANGUAGE**  
Understanding others





**Expressive language** deficits are often easy to identify.

Some children appear to understand what others are saying – for example, they can follow directions, but they may have difficulty using words to share their own ideas or express their feelings.

**Receptive language** problems are only apparent when it is clear that children cannot follow directions or comprehend the information they hear. Many times receptive language problems are missed because some children are very adapt at watching others and simply following them.



As a result, receptive language problems are usually not identified until the child is at least 3 years old.

A comprehensive review of services for children with speech, language, and communication deficits in the U.K. observed that there was an inadequate understanding of the importance of children's language development among practitioners, commissioners, and policymakers.

Dockrell, 2014

“Language competence can be difficult to define, though we are acutely and immediately aware when it is lacking in an interpersonal exchange.

In fact, somewhat like the air around us, we don't give it a great deal of thought until we perceive that there is something wrong.”

-Snow 2013

IMPACTS

# LANGUAGE DEFICITS ARE LINKED TO BEHAVIOR PROBLEMS IN YOUNG CHILDREN

2 in 3

language-delayed  
3-year-olds have  
behavior problems.

Very basic, early developing language and speech skills had been previously thought to be relatively free of the impacts of growing up low-income (Roy, 2014)

“It is not enough to just hear the words.”

# Roots & branches

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Roots  
**COMPREHENSION**





Children growing up in low-income households on average hear far fewer words and are exposed to a more limited vocabulary than those in middle-and higher-income homes.

CHILD 1

CHILD 2

CHILD 3

Number of  
Words Heard

13  
MILLION

26  
MILLION

45  
MILLION

Number of  
Questions  
per Hour

5

20

40

Affirmations  
Vs.  
Prohibitions

5/11

12/7

32/5

Listening  
Vocabulary by  
Kindergarten

3,000

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Listening  
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There is a **19-month** language gap between lower- and higher-income children at school entry.



**3,000**  
WORDS



**20,000**  
WORDS

# PRESCHOOL EXPULSIONS

occur at a rate more than 3 times that of grades K through 12.



# PRESCHOOL EXPULSIONS

occur at a rate more than 3 times  
that of grades K through 12.

3,000 words  
or  
20,000 words



A cohort study following over 11,000 children from birth to adulthood found that those with poor vocabulary skills at age 5 were :

**4X** more likely to have **reading difficulties** in adulthood,

**3X** more likely to have **mental health problems**, and

**2X** more likely to be **unemployed** when they reached adulthood.

A longitudinal cohort study following 19,000 children from birth, observed that **the most important factor** in reaching the expected levels in reading and math at age seven **was children's language skills at age five.**

This was greater than the link to poverty or poor parental education.

Law, et al



WHAT DO LANGUAGE  
DEFICITS LOOK LIKE?

“The difference between the right word and the almost right word is the difference between lightning and a lightning bug.”

Mark Twain

## Difficulty with...

- Receptive and expressive language development
- Abstract communication skills (sarcasm, indirect commands)
- Pragmatics (peer body language and non-verbal cues)
- Language processing

Language deficits include the inability to process and understand everyday abstract language, including the idioms and metaphors that we use to “spice up” everyday interactions.

For example we say,

“She gave me the cold shoulder.”

“The homework is a breeze.”

“Nothing is written in stone.”

Most people know that nonverbal messages can overshadow the verbal with respect to their relevancy.

Children with language deficits often struggle with social cues that are ambiguous, such as nodding of the head and eye contact.

Cross, 2011

Remember...

It is not enough to just  
hear the words.

Snow, C. E., Perlmann, R., and Nathan., D. (1987)

The presence of behavior difficulties can blind adults to the existence of language impairments.

The lack of experience with typical verbal exchanges, in which all parties are listened to, might be a disadvantage to young people whose past experiences have centered around hostility, blame, retribution, defensiveness, and brief emotionally charged verbal exchanges.

We then assign “cause” to the behavior and react to the “cause” instead of the language deficit.

We often characterize behavior.

# ATTRIBUTION

at·tri·bu·tion

*Noun:* the action of regarding something as being caused by a person or thing.

Our reaction is often based more on why we think someone behaved a certain way than on the behavior itself.



Persistent disruptive behavior often keeps underlying language difficulties from being diagnosed if behavioral issues are treated as the primary problem.

-Law, 2017

“When children don’t have  
language, their **behavior**  
**becomes their language.**”

Judge Peggy H. Walker  
Douglas County Juvenile Court

It can help to re-conceptualize behavior problems as skill-deficits, and keep in mind that behavior itself is often a form of communication.

Snow, 2013

Unidentified language impairments are often characterized as rudeness, disinterest, poor motivation, and a lack of willingness to engage.

Snow, 2013

# LANGUAGE AND CHILDREN'S MENTAL HEALTH



# WHAT IS CHILDREN'S MENTAL HEALTH?

The ability of children to reach developmental and emotional milestones; learn and demonstrate healthy social skills; and solve problems.

The **ability** of children to develop, function, and thrive.

# WHAT ARE CHILDREN'S MENTAL HEALTH DISORDERS?

Serious deviations from expected cognitive, social, and emotional development.

The **inability** of children to develop, function, and thrive.

Studies of children ranging from ages 4 to 13 show that language deficits predict later behavior problems more strongly than behavior problems predict later language deficits.

This illustrates that the direction of effect is more likely to be from language deficits to behavior problems.



Speech and language problems are the most frequent disability of childhood, yet they are the least identified.

Sices, et al

The prevalence of previously unidentified language deficits in children age 5 to 13 with mental health disorders is **81%**.

Hollo, 2014

The prevalence of previously unidentified language deficits in children age 5 to 13 with mental health disorders is **81%**.

Hollo, et al.

**In other words...**

4 in 5 children with mental health disorders have a language deficit that escaped the attention of significant adults...



...when screenings, early evaluations, and speech-language therapy could be meaningful.

Identification of language deficits is complicated by the fact that they are often **attributed** to other diagnostic conditions.

For example, the diagnostic criteria for ADHD share several characteristics with language disorders including:

- difficulty listening when spoken to,
- following instructions,
- talking excessively,
- blurting out answers,
- interrupting, and
- waiting for turns in conversation.

The most frequent mental health diagnosis of children with language deficits is ADHD.

Mueller, et al., 2012

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Mueller, et al., 2012

Involving Speech and Language therapists in behavioral evaluations of children thought to have ADHD may improve the likelihood that symptoms of language impairment are not **attributed** to symptoms of attention deficit.

Providing appropriate support to children with language deficits is likely to increase their social and emotional engagement and reduce the likelihood of secondary behavioral difficulties.

BMC Psychiatry, 2017

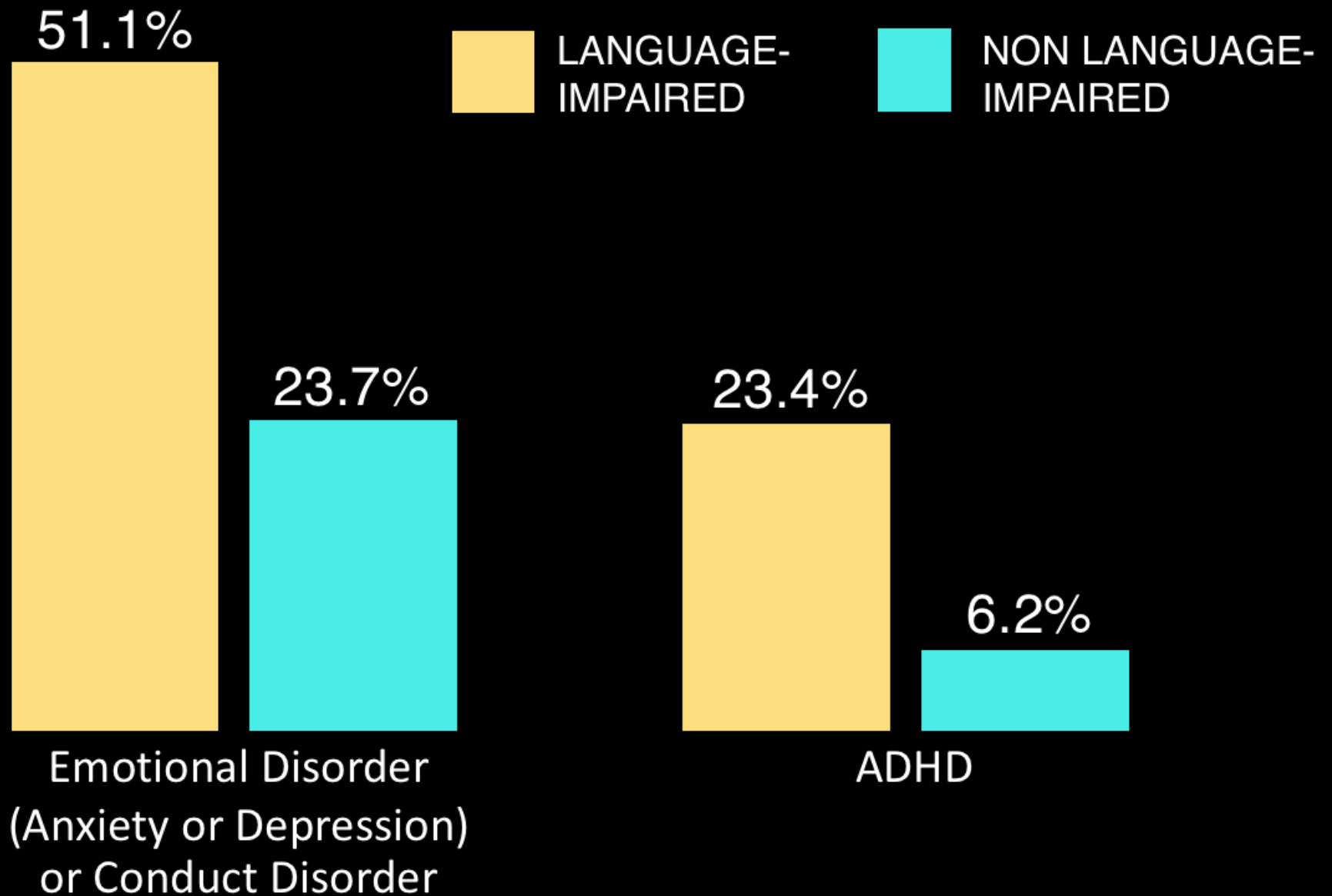
Up to 20% of children age 3 to 17 years have diagnosable mental health disorders.

The most frequent diagnoses are:

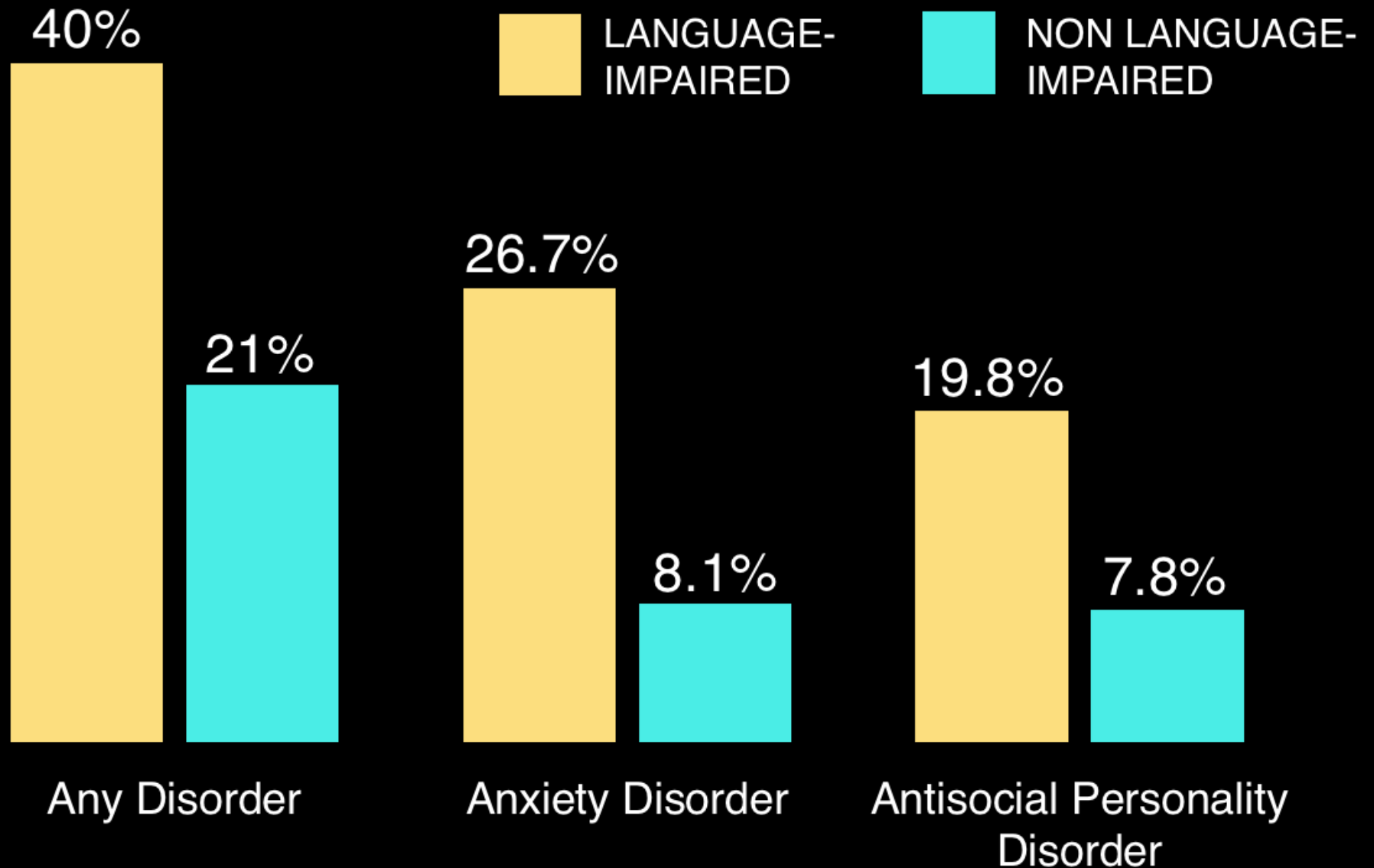
- ADHD
- Conduct Disorder
- Anxiety
- Depression



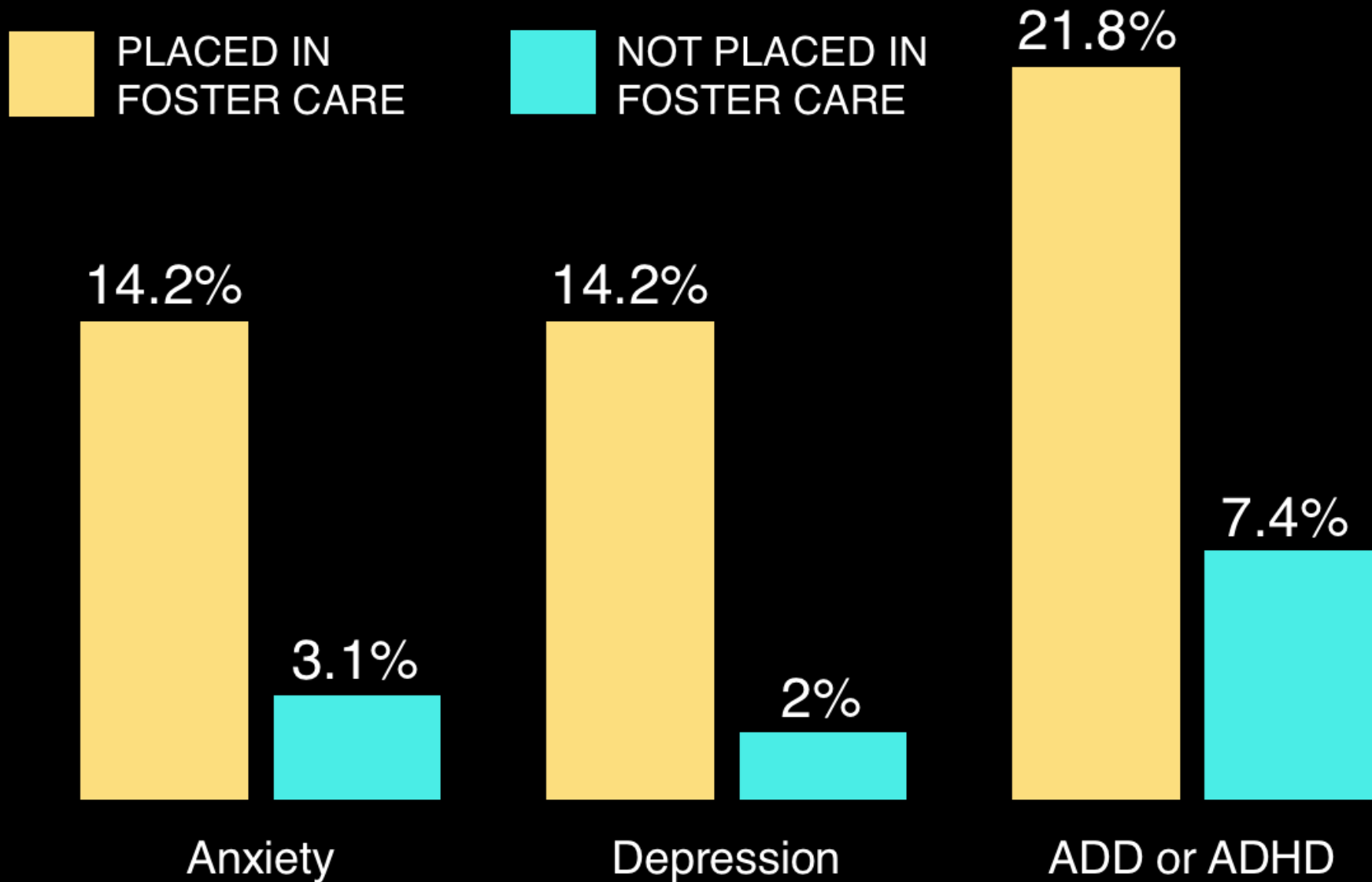
# RATES OF MENTAL HEALTH DISORDER AT AGE 12 BY LANGUAGE-IMPAIRED STATUS AT AGE 5



# RATES OF MENTAL HEALTH DISORDER AT AGE 19 BY LANGUAGE-IMPAIRED STATUS AT AGE 5



# RATES OF MENTAL HEALTH DISORDERS AMONG CHILDREN IN FOSTER CARE AND CHILDREN NOT IN FOSTER CARE



WHAT DOES THIS MEAN?

Operating at the surface level when the situation requires a deeper understanding of a child's emotional state can result in a young person being judged as selfish or uncaring.

Consider instead the possibility of a language deficit.


Children with language deficits are often extremely disorganized and agitated in an unstructured verbal situation when they cannot fully comprehend or respond to the language stimuli with which they are confronted, and this behavior may easily be misinterpreted as “psychotic” or “borderline.”

Gualtieri et al.



Psychotherapy for children is often based on the assumption that the child's language represents their thoughts and feelings.

For children with language deficits, such a situation is not only likely to be ineffective, but may also be confusing and stressful.



Understanding a child's language deficit will not only influence the diagnostic process, it will also help determine the best treatment approach to mental health disorders.



For example, a 10-year-old boy was referred with a diagnosis of psychosis based on his peculiar responses in testing. During therapy sessions, he was extremely active and talkative. Questioning and problem-solving approaches often led to inappropriate and peculiar verbal responses.

A speech and language evaluation identified a severe deficit in his comprehension of language. When the therapist lowered his expectations of high level verbal responses and added visual cues (pictures and drawings), the child's activity level decreased and he was able to work with the therapist.

He was able to draw pictures of problem situations (e.g., being teased by peers) and then draw alternative ways of dealing with frustration and anger.

In another example, a “10-year-old boy had difficulty separating from his mother. Attempts to deal with this behavior verbally simply intensified his anxiety. A previous interpretation of the situation had led other clinicians to diagnose a “symbiotic psychosis.” Unfortunately, this term was of no value for understanding the genesis of the problem or for generating treatment approaches.

Our clinical suspicion was that the child’s cognitive and language deficits made it difficult for him to understand why his mother was leaving and to know when he would be seeing her again. In fact, we learned that he did not understand the words staff had been using to reassure him or the time concepts we used to explain when his mother would return.

By simplifying the language of caretakers, using a calendar as a pictorial guide and rehearsing separation situations with him, the separation problems quickly resolved.”

In another example, a five-year-old student had temper tantrums every time the teacher instructed the students to move from one activity to another.

The teacher, because of her training, noticed that the student did not appear to understand the instructions. Therefore, she gave the student a stuffed animal to take with him during any type of transition; the temper tantrums ceased.

HOW DO  
LANGUAGE DEFICITS  
IMPACT CHILDREN IN  
FOSTER CARE?

“Both [child] neglect and abuse are associated with serious, pervasive and long-term sequelae for a range of neuropsychological functions, **including expressive and receptive language abilities.**”



Children with language deficits, compared to their counterparts, are:

**7X** more likely to experience **emotional maltreatment**

**5X** more likely to experience **neglect and physical abuse**

**3X** more likely to experience **sexual abuse**

Children with language deficits, compared to their counterparts, are:

**7X** more likely to experience **emotional maltreatment** that leads to dysfunction

**5X** more likely to experience **neglect and physical abuse** that leads to more neglect and abuse

**3X** more likely to experience **sexual abuse** that leads to more victimization

Children in foster care are nearly **two and a half times** more likely to suffer from language impairments than their counterparts.





In contrast to the estimated **4% to 10%** prevalence of developmental delay among children in the general population, published rates of delay among young children in foster care are reported to be as high as **60%**, with **57%** exhibiting language delays.

Leslie, et al.



Children in foster care who are in talk therapy, counseling, and case planning are effectively in a “second language” environment if their receptive and expressive language skills are deficient and have not been diagnosed and treated.

# ARE LANGUAGE DEFICITS LINKED TO YOUTH OFFENDERS?



Research into the prevalence of speech, language, and communication difficulties among youth in secure detention found that **more than two-thirds** had below average language skills.

Bryan, 2007



Youth involved with juvenile justice are up to 5 times more likely than their non-offending peers to have language difficulties, **reducing their ability to benefit from talk-based therapies aimed at reducing recidivism.**



About 50 to 60 percent of young male offenders have **clinically significant** levels of language deficits.

Most young male offenders are not given a speech and language evaluation.

# Oral Language Difficulties and the Restorative Justice Conference: How might these look?

Snow, 2013

Oral Language Difficulty	Manifestation in an RJ conference
<p>Reduced auditory comprehension, for example, difficulties understanding vocabulary, complex grammar, figurative language</p>	<ul style="list-style-type: none"> <li>• The young person <i>appears</i> to understand what is being said, and may nod in agreement, but misses important information and nuances.</li> <li>• Difficulties processing (making sense of) long, embedded sentences (for example, <i>The student who spoke to your mother at the supermarket is the boy whose friend you met at a party last month</i>).</li> <li>• Difficulties processing (making sense of) figurative language.</li> <li>• Suggestibility/acquiescence/over-compliance—the young person wants to “please” and may agree to inaccurate propositions, in order to do so.</li> </ul>
<p>Reduced expressive vocabulary</p>	<ul style="list-style-type: none"> <li>• A lack of emotion-related words, such that expressing remorse and saying things that convey authenticity and genuineness — even if these are felt and intended—can be difficult.</li> <li>• “Yep,” “nope,” “dunno,” “maybe”—all minimalist responses aimed at avoiding having to speak, but potentially conveying resistance to engagement in the process.</li> </ul>
<p>Reduced expressive syntax</p>	<ul style="list-style-type: none"> <li>• A tendency to produce short, unelaborated sentences, making the young person seem immature or intellectually impaired.</li> </ul>
<p>Reduced concentration skills</p>	<ul style="list-style-type: none"> <li>• Being easily distracted, becoming restless, not focusing on the discussion at hand—and as a consequence, appearing to be rude or uncaring.</li> </ul>

Hughes, et al. (2017). Language impairment and comorbid vulnerabilities among young people in custody. *Journal of Child Psychology and Psychiatry*, August.

The authors concluded:

“Given what is known about pathways into offending...assessment of language skills [should occur] at various points, including:

- When behavioral problems...are first emergent;
- When a child is at risk of exclusion from school;
- When mental health difficulties are apparent;
- On first contact with the justice system; and
- In planning interventions following a conviction.”



Distribution is related to  
patterns of determinants  
that provide clues to  
identify solutions.

HOW EARLY  
MIGHT WE LOOK  
FOR CLUES?



# ANOTHER DETERMINANT OF LANGUAGE DEFICITS



Premature Birth

A premature birth is one that occurs before the start of the 37th week of gestation. Full-term is at 39-40 weeks and very preterm is less than 32 weeks.

Mayo Clinic

**40 percent** of children in foster care are born prematurely (<37 weeks of gestation) or low birthweight (<5.5 pounds)

Ensuring the Healthy Development of Infants in Foster Care, 2004

Language difficulties are prevalent in premature children and include articulation problems and expressive language delays, which can manifest themselves as poor vocabulary and grammar.

Ribeiro, et al

Preterm birth is likely to have long-term consequences, affecting linguistic development beyond preschool.

Guarini, et al

Children born before 28 weeks of gestation, but without severe neurodevelopmental disorders, are still up to **8X** more likely to have symptoms indicating mental health problems by age 11.



Newborns admitted to a neonatal intensive care unit (NICU) are **6X** more likely at 36 months to develop disorganized attachment than their counterparts – an indicator highly predictive of later mental health disorders.





Language skills provide a protective role in the development and maintenance of self-esteem in youth born extremely low birthweight.

Journal of Child Health Care, 2017

OPPORTUNITIES

**(1) Include children's language**  
as a child well-being indicator just  
as we do with vision, hearing, oral  
health, etc...



**(2) Conduct a statewide comprehensive review** of services for children with speech, language, and communication deficits to inform practitioners and policymakers.

In the meantime, local providers of children's services – across all sectors – could conduct such a review.

**(3) Examine communication development at all well-child (Health Check) visits.** Inform caregivers about expected social communication milestones and how to promote their development, recognize difficulties, and get additional support.



**(4) Include speech-language pathologists (SLPs) at the policy level** to help develop and implement policy and practice changes to identify and address children's language development.

**(5) Provide language assessments as part of all evaluations and re-evaluations for Individualized Education Programs\* (IEP) and 504 Plans.**

\*For children ages 3 – 21

**(6) Mental health providers should refer** children and youth with mental health disorders to a SLP for screening, assessment, and appropriate intervention.





**(7) Include SLPs in behavioral evaluations** of children thought to have ADHD.

**(8) Develop and implement a strategy that leverages** the recent addition of SLPs to the list of Medicaid provider types who may provide services via telemedicine.



**(9) Identify speech and language issues and provide appropriate interventions to address language deficits among children in foster care.**



## **(10) Include as part of the Comprehensive Child and Family Assessment (CCFA)\***

### **process:**

- speech-language screening and assessment results; and
- implications of results for developing and implementing appropriate plans of care (health, safety, education, permanency) to support healthy development.

\* The CCFA is a detailed assessment conducted for children entering foster care to support service planning and decision-making regarding the safety, permanency, and well-being of children, youth, and families.

**(11) For children involved (or at-risk of involvement) with juvenile justice,** provide speech-language screenings, and when indicated, further assessments and appropriate interventions.



**(12) Provide training** to increase awareness and understanding of the relationship between language and mental health so that appropriate responses are provided that meet the child's needs, such as speech-language therapy.

Training should include juvenile court judges, mental health providers, physicians, nurses, school system staff, child care providers, case managers, CASAs, juvenile justice staff, caregivers, and other stakeholders.



**(13) Provide Language Nutrition coaching training** for workforces and groups already working with parents and young children, such as nurses, physicians, mental health providers, WIC nutritionists, medical assistants, infant and toddler teachers, and foster parents.



**(14) Create the Children's Communication Trust** to facilitate and coalesce all efforts related to children's communication skills and needs.

The universal monitoring of children's language skills already takes place in the United Kingdom.



**WE CANNOT AFFORD  
TO DO THIS!**

**WE CANNOT AFFORD  
NOT TO!**

1:8

An economic evaluation found that **every \$1 invested** in enhanced speech and language therapy with children with language impairment could potentially **generate more than \$8** through increased lifetime earnings.

Marsh, et al.

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fighting the existing reality.

To change something, build a  
new system that makes the  
existing system obsolete.

-BUCKMINSTER FULLER