Spring 2022

Trouble Sitting Still Disorder: ADHD Through the Social Model of Disability

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Senior Capstone

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June 8, 2022

Abstract

Attention deficit hyperactivity disorder (ADHD) is a neurodevelopmental disorder characterized by issues with attention, hyperactivity, and impulsivity. The medical model of disability sees ADHD as something to be fixed within an individual. The social model, in contrast, looks at how the organization of society negatively impacts those with ADHD. The diagnostic criteria in the DSM-V does not fully reflect the lived experiences of those with ADHD which leads to adults not getting diagnosed. Undiagnosed ADHD can cause anxiety and depression which, in turn, can mask ADHD—making it harder to accurately diagnose. Additionally, symptoms are misunderstood by society which leads to harmful stereotypes. These stereotypes create barriers to care for people with ADHD by perpetuating the idea that ADHD is harmless. Going forward, the criteria in the DSM-V should be reassessed and adult-specific criteria added. A new name might be in order to facilitate the movement away from harmful stereotypes and towards a more compassionate understand of the struggles faced by those who live with ADHD.

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Models of Disability

When talking about disability, there are two predominant models—medical and social. These models come from different angles to describe what "disability" is and where it comes from. The medical model of disability frames disability as something "wrong" with a person and focuses on "fixing" them with the implied goal of getting them to fit into society (Disabled World, 2010). In contrast, the social model sees disability as a barrier constructed by the way society is set up. In the case of a wheelchair user unable to enter a building, the social model would say that the lack of ramp is the problem, not the fact that the person is in a wheelchair. Thus, the medical model focuses on changing the person to fit society while the social model focuses on changing society to fit the person.

The social model distinguishes between the terms "impairment" and "disability". Impairment is the actual attribute that affects the person while disability, as defined in the Union of the Physically Impaired Against Segregation document, is "the disadvantage or restriction of activity caused by a contemporary social organization which takes no or little account of people who have physical impairments and thus excludes them from participation in the mainstream of social activities" (Finkelstein, 1975, p. 4). The social model of disability was originally conceptualized around physical disability, as is evident in the quote above, and exclusion such as lack of accessible entrances and other accommodations. It later expanded to include people with learning disabilities; intellectual disabilities; and emotional, mental health, and behavioral problems.

ADHD

Attention deficit hyperactivity disorder (ADHD) is a neurodevelopmental disorder that is characterized by issues with attention, impulsivity, and hyperactivity. Currently, according to the DSM-V, there are three subtypes: predominantly inattentive (ADHD-I), predominately hyperactive-impulsive (ADHD-H), and combined (ADHD-C) (American Psychiatric Association, 2013).

ADHD's history begins in 1902 when Sir George Frederic Still gave a series of lectures on disruptive children's behaviors (Lange et al., 2010). Still's descriptions included disorders that would eventually become known as ADHD, conduct disorder, oppositional defiant disorder, and antisocial personality disorder. Thirty years later, Franz Kramer and Hans Pollnow differentiated "hyperkinetic disease of infancy" from other diseases.

The diagnostic and statistical manual of mental disorders (DSM) is a tool clinicians use to diagnose mental disorders. Its history is chronicled by Epstein and Loren (2013) starting at the beginning in which the first version, simply named DSM-I, was published in 1952 and did not have an entry analogous to ADHD. The DSM-II in 1968, had a predecessor of ADHD named "hyperkinetic reaction of childhood" that primarily focused on excessive motor activity. In 1980, the DSM-III included attention deficit disorder (with or without hyperactivity); ADD (without hyperactivity) was removed seven years later in the revised DSM-III and all symptoms fell under ADHD. With the publication of the DSM-IV in 1994, ADHD without hyperactivity was reintroduced in its present form as the subtype ADHD-I. Twenty years later the DSM-V kept the three subtypes and the previously established 18 criteria (see Appendix). Between the DSM-

IV and DSM-V, ADHD was recognized as not just a childhood disorder; the DSM-V added additional examples as to how these symptoms could manifest. There are 9 criteria in the two categories, inattentive and hyperactive/impulsive. Six symptoms must be present for children to be diagnosed with ADHD but five for those over the age of 16. Six in both categories indicates the combined type of ADHD.

Diagnostic Issues

There are a few problems that are prevalent when diagnosing ADHD. One is that ADHD is haunted by its history as a childhood disorder. Another aspect of its past is its strong association with hyperactivity which means that the inattentive subtype is often missed. Additionally, ADHD is often comorbid with another condition, that is, it occurs at the same time as another condition. In fact, approximately 75% of those with ADHD also have another mental disorder (Watters et al., 2017). Over time, ADHD can even cause these other conditions due to the societal environment someone lives in. These other conditions, plus many more, hide ADHD either because they share similar symptoms or doctors are more familiar with these other conditions and can more readily identify them.

Age. Since ADHD has been understood in a childhood context, the conceptualization and identification of ADHD in adults has been difficult. The DSM-V includes some examples for older adolescents and adults but, ultimately, the criteria in the DSM-IV were developed for diagnosing children. In addition, the DSM criteria are static, whereas symptom presentation can change as a person grows older (Ramtekkar et al., 2010). Some adults may not have a high enough symptom count to be diagnosed despite the fact that they may have been diagnosed if they had been evaluated at a

younger age. This highlights the need for age-specific criteria as adults are suspected to be underdiagnosed (Ginsberg et al., 2014; Simon et al., 2009).

Gender. There is a notable discrepancy in the rate of diagnosis between boys and girls. Boys are diagnosed at least twice as often as girls in childhood (Ginsberg et al., 2014; CDC, 2021). This, once again, is rooted in the historical understanding of ADHD manifesting as hyperactivity. Boys more often present with the predominate hyperactivity/impulsivity subtype than girls and hyperactivity is more visible—and often disruptive to others—leading adults around the child want him assessed (Katzman et al., 2017). Girls, on the other hand, often present with the predominate inattentive type which does not disrupt those around her and may lead to adults not noticing that there is a problem or pursuing disgnosis (Ford-Jones, 2015; Katzman et al., 2017).

Interestingly, while there is still little data about prevalence rates for adults, some studies have found that women are diagnosed more often than men (Ginsberg et al., 2014). However, this could partially be due to women being more likely to seek psychiatric help for other mental disorders that are often comorbid with ADHD (e.g., depression, anxiety, and other mood disorders). In one study, 20% of women who sought outpatient psychiatric care for a different condition were diagnosed with ADHD compared to about 8% for men (Montes et al., 2007). Additionally, since men are more likely to be diagnosed in childhood, it is possible that there aren't as many undiagnosed men as women when they get to adulthood.

Comorbidity/Masking. ADHD has a complex relationship with a host of other mental conditions including but not limited to autism, depression, anxiety, bipolar disorder, substance use disorders, and personality disorders. Along with these six, the

DSM-V lists 10 more possible differential diagnoses for ADHD; differential refers to other disorders that could be causing a person's symptoms. For context, the disorders that come before and after ADHD in the DSM-V, autism spectrum disorder and specific learning disorder, have seven and six differential diagnoses respectively. With 16 other disorders that share symptoms it could be the case that some individuals with ADHD get misdiagnosed with one of these others. To muddy the waters further, the DSM-V explicitly lists nine of these differential diagnoses as possible comorbid conditions (i.e., disorders that are present at the same time).

When ADHD and another disorder are comorbid, the other disorder can mask ADHD symptoms. For example, the anxiety of arriving late to a restaurant could spur someone with ADHD to leave unreasonably early and then have to wait for an hour before the rest of their party arrives. Chronic lateness is common in ADHD but paired with anxiety in this case, that manifestation of ADHD disappears as the anxiety masks the ADHD. In other cases, another disorder may be misdiagnosed as the cause of some ADHD symptoms while masking others. For example, depression also features difficulties concentrating and can result in noticeably sluggish movements, the antithesis of the hyperactivity seen in ADHD. The difficulties in concentrating could be due to either depression or ADHD (or both) and sluggish movement may mask ADHD hyperactivity which would lead to a depression diagnosis instead of an ADHD diagnosis. The ADHD is missed until the depressive symptoms get treated and the person finds that they are still having trouble with concentration.

Sometimes it doesn't take another disorder to mask ADHD. "Masking" (or "camouflaging") can also refer to when a person hides some part of themselves in order

to fit in with a social group (Cuncic, 2022). This is often achieved by copying the behaviors of people who don't have ADHD and repressing other behaviors. Masking is more often discussed in the context of autism where a person with autism tries to stop stimming or force themself to make eye contact even if it's painful. Masking in ADHD may include obsessively checking belongings to make sure nothing was left behind, hiding any sign of struggling or being overwhelmed, or repressing stims like leg bouncing or pen tapping. The person who is masking might not even know they have ADHD and by masking, other people are less likely to see any symptoms indicative of ADHD.

If attempts at masking are unsuccessful then the person with ADHD may be ostracized by peer groups which could result in lower self-esteem. A person with ADHD may feel shame that they can't do tasks that are easy for people without ADHD to do such as chores or completing assignments. Not being able to keep up with such things means that they pile up and become overwhelming. These things can contribute to depression, making it harder to do "simple" things, leading to more shame and guilt, and thus creating a negative feedback loop that exacerbates both conditions. To take it even further, in order to cope with these emotions, someone might turn to drugs or alcohol and could develop a substance abuse disorder. Here we see ADHD leading to two other disorders, all the while being the least visible of the three comorbidities.

Stereotypes

There are a number of stereotypes surrounding ADHD that are not only false but harmful. The hyperactive, disruptive boy is the foundational stereotype on which others are built. This stereotype is so well established that people feel confident that they know

this is how ADHD manifests, since people think they know what ADHD is, they don't feel the need to ask more questions or learn more about it. This creates an environment where, at its core, ADHD is considered harmless and thus is often not taken seriously.

The phrase "whoops, sorry, I'm so ADD/ADHD right now" might not be unfamiliar. It might be said when someone is having trouble concentrating on something or if they're tapping their pen. It's similar to when people claim that they're "so OCD" when they want things organized or clean. These phrases trivialize these disorders by making them "quirky" or "endearing" personality traits when, in reality, they are disabling. Claiming ADHD, and not actually suffering from the disorder, perpetuates the idea that ADHD is harmless. This sentiment along with another thrown about phrase, "isn't everyone a little ADHD", implies that if everyone has ADHD and are doing fine then you should be able to overcome your ADHD as easily. It reinforces the idea that those with ADHD aren't "trying hard enough" when, in fact, they're spending all their energy in trying to keep up.

Additional energy may be directed towards wrangling emotions due to poor emotional regulation especially around actual—or perceived—rejection, a phenomenon referred to as rejection sensitive dysphoria (RSD). A Twitter user expresses their frustration of this particular portrayal in their post:

> I rlly [*sic*] do hate that adhd has turned into this quirky trait that makes u [*sic*] dance crazy or get *cutely distracted uwu*. It's not cute when you lay in bed all day with something to do but you physically cannot get your brain to do it, or you lose expensive items or you have RSD (Alex, 2021)

RSD can have an impact on both a person's self-confidence and on their social relationships. If a person feels rejected by their friends they might ask for reassurance that that's not the case. However, due to the amplified feelings of RSD a person with ADHD might want/ask for reassurance multiple times which may annoy those friends, which the person with ADHD might read as more rejection and the cycle feeds into itself. Alternatively, a person with ADHD may just accept the rejection, be it real or fake, and cut themselves off from a friend group in an attempt to protect themselves from a confrontation. In their examples, Alex brings up some struggles faced by those with ADHD such as executive dysfunction, the "ADHD tax", and RSD. Executive dysfunction is often described as being trapped in your own body and unable to initiate tasks. The ADHD tax is a term used to describe the cost of living with ADHD. This can be in financial terms such as: parking/traffic tickets, late fees, impulsive shopping (and then struggling to return items), forgetting to cancel subscriptions, having to buy replacements for lost items, and food spoiling. The ADHD tax can also be paid in time and personal wellbeing in the form of having to redo projects or filling out forms more than once. People with ADHD may forget to seek preventative care and may miss routine doctor's appointments.

Evolutionary models of ADHD do well to demonstrate the mismatch of ability versus environment, i.e., in a differently structured society, ADHD abilities could be assets. The example that is perhaps the best known is that of the hunter/farmer explained by Hartmann (1993) in his book *Attention Deficit Disorder: A Different Perspective.* In this model, the traits of ADHD are traits that would have been advantageous in a hunter/gatherer society. Distractibility could be the thing that warns

of an oncoming predator, impulsiveness could lead to new food sources (by way of impulsively eating a new and strange food), and aggressiveness could be beneficial in hunting or warfare. Hartmann explains that the “farmers” would be those who could plan the crop, wait for them to grow, and keep track of inventory. These traits that would translate to the modern day as household management, delayed gratification, and general organization in all areas of life. Those with ADHD would be the hunters and those without ADHD are the farmers. So, in the past, ADHD traits could have been beneficial, but as society changed and grew around agriculture, these traits become maladaptive.

Since the struggles of ADHD are largely invisible, people without ADHD may make assumptions about why someone with ADHD does certain things. A common symptom of ADHD is “time blindness” stemming from issues with executive functioning; a set of skills that include working memory, self-monitoring/self-control, organization, and time management. This time blindness means that a person with ADHD misjudges how long something will take (or took), like getting ready for a meeting (Weissenberger et al., 2021). They end up running late and causing the other attendee to feel that the person with ADHD doesn’t care or respect their time when, in fact, they do care and chastise themselves for being late. Losing, forgetting, or accidentally damaging things can also get someone with ADHD labelled as uncaring or disrespectful. It can take just a moment of inattention to set something down and leave it somewhere it probably shouldn’t be, like setting down an important piece of paper only to lose it in the shuffle of the rest of the mail. This can leave someone with ADHD to scramble to either try to find the paper or hide the fact they lost it in the first place.

There's a quote, made famous by British actor Michael Caine, "Be like a duck, my mother used to tell me. Remain calm on the surface and paddle like hell underneath" (as quoted in, Grothe, n.d.). Now imagine a duck is born without webbed feet, yet it still keeps pace with its peers by working harder. This duck represents many people who struggle with ADHD, which is reflected by a participant's response in Webster's (2018) study, "Nothing about my life worked without twice the effort of everyone else and, more often than not, I did all that work for less reward". People with ADHD often have to work harder only to be told that they are lazy. This issue can be exacerbated as a person with ADHD goes through schooling. At younger grades there is more external structure, scheduling, and accountability from parents and teachers. Some with ADHD do well in these environments but when these supports start to fall away in later grades, at a time that students are expected to be more independent, they start to struggle. As another participant in Webster's (2018) study recalls:

> My grades at school got worse and worse as independent study became more of a necessity and was written off as lazy as I had been a top student. I believed what I was told and decided I didn't care about school.

What necessitates this extra effort? Contrary to the beliefs that ADHD is caused solely by lax parenting or chemicals in the food, there are differences in the brain that have been detected and studied. There are structural and chemical differences in the brains of those with ADHD from those without such as different levels of neurotransmitters. Neurotransmitters are the chemical messengers of the brain and some famous ones being serotonin, dopamine, and norepinephrine (i.e., noradrenaline which is closely related to adrenaline and serves related purposes). Lower levels of

dopamine contribute to the symptoms of ADHD, primarily in attentional control and executive functioning (Sergeant et al., 2003). One of the most effective treatments for ADHD is stimulant medication because they boost the levels of dopamine in the brain. Stimulant medication is considered a first-line treatment for people over the age of five; ideally medication would be accompanied by cognitive behavioral therapy or other coaching (Cortese, 2020). Stimulants improve ADHD symptoms in 70% of adults and about 75% of children (Cleveland Clinic, 2016). Despite how well stimulants work for a majority of people with ADHD they can be difficult to get. They are strictly regulated due to the fact that dopamine also has a role in creating and sustaining addiction.

The abuse potential of stimulants led to them being classified as a Schedule II controlled substances in the United States. Schedule II substances are considered to have high abuse potential which may result in severe physical and/or mental dependence but have some approved medicinal uses. Other Schedule II drugs include morphine, oxycodone, codeine, and opium. It's this fear of abuse that makes people hesitant to pursue stimulant therapy for them or their child. Some preliminary studies have shown that children who take some sort of stimulant ADHD medication do not have a higher risk of developing substance use disorder (Chang et al., 2014; Wolpert, 2013). Quinn et al.'s (2017) research in substance use related hospital visits revealed that people with ADHD who were medicated had lower odds of returning to the hospital than their unmedicated ADHD counterparts.

So why is there still such fear of abuse? Adderall itself is well known as a "study drug" which is defined as a prescription stimulant (i.e., Schedule II stimulants such as Adderall, Ritalin, Concerta, and Vyvanse) taken without a prescription in order to focus

and stay awake to study. Possession (without a prescription) and distribution (regardless of prescription) of study drugs are federal crimes as well as pretending to have ADHD in order to get a prescription. These fraudulent claims of ADHD that brings harm to the ADHD community, leading to a stereotype that all people claiming to have ADHD are drug seekers. People without ADHD looking to abuse stimulants drive the drug seeker stereotype and make it more difficult for those who have ADHD to access resources.

Since Adderall abuse is arguably more known compared to ADHD itself, it's often what people think of first. This leads to various accusations against the person with ADHD when coupled with ignorance of the disorder. People may think that it's unfair for someone with ADHD to take Adderall since they see the medication as a performance enhancer when in reality, it "evens the playing field". Recall that stimulants like Adderall increase the levels of dopamine in the brain. In a person without ADHD this would raise levels above what's typical and create the "high" that people use to study, or party, longer. In a person with ADHD, baseline levels of dopamine are low so raising the amount of dopamine via stimulants results in a more typical level. An anecdote from tumblr user pizzaforpresident (n.d.) illustrates this:

> I went to a party once and everyone was supposed to pitch in some money to buy Adderall. I had never tried or even heard of it but I was young and stupid so I gave them 20 bucks. Later on, after we all took it, everybody was going crazy and having a good time and I was just sitting on the couch quietly so I googled 'adderall' on my phone and learned that it's used to treat ADHD. I have ADHD. I paid 20 dollars to calm down.

At therapeutic doses in people with ADHD, stimulant medication does not cause a euphoric high, especially since people start on the lowest dose and slowly raise it until it reduces their symptoms without unmanageable negative side effects. While it's not impossible for a person with ADHD to abuse their own meds, compliance with treatment plans, oversight from a doctor, and even pill counting minimizes this risk.

The Future

The medical and social models of disability provide two routes to improve the perception and understanding of ADHD. The medical model would be tackled via the DSM and the diagnostic criteria. The social model would include awareness and education, as ignorance of ADHD is a common theme among the stereotypes discussed.

In terms of improving the DSM and the diagnostic process for ADHD, the current criteria were created for diagnosing children. This means that they are not ideal for identifying adults with ADHD even with inclusions of example situations. Adult-centric symptom domains should be developed, or current criteria reworded to better reflect adult presentation. Additionally, there are symptoms that are commonly experienced by people with ADHD that could be discussed during evaluation in order to aid diagnosis, even if they are not made official criterion. In practice this may include discussing how someone reacts to rejection in order to determine if they experience RSD or asking about their time management to assess their degree of time blindness. Care should be taken in the evaluation process to untangle any comorbid disorders that may be hiding ADHD symptoms. For example, in the case of someone who is afraid of being late and is driven by anxiety to arrive early instead, the lack of chronic lateness may discourage

an ADHD diagnosis. Diagnosticians should query beyond whether someone is chronically late to determine if anxiety may be masking and ADHD symptom. It might be clinically useful to bring up these “secondary symptoms” during evaluations as well as discussing lived experiences of people with ADHD as the person getting evaluated may even hold false beliefs and not see ADHD symptoms in themselves (especially if they assume ADHD is only hyperactivity).

Since ADHD poses significant challenges in the school setting, teachers have unique opportunities to observe behaviors that may indicate ADHD. If teachers were made more aware of ADHD and the different ways it may manifest they might not be so quick to write a child off as just a troublemaker or slacker if they’re being particularly rambunctious. Teachers of older students should be cognizant of the work they’re assigning and check in with students. If directly asked how an assignment is going a student with ADHD may be more likely to admit that they’re stuck on something instead struggling silently. Teachers should also be aware that some characteristics of ADHD that are commonly misunderstood as off-task behavior (e.g., doodling during class) may actually help the student maintain concentration. Punishing or discouraging these behaviors may impede the student’s success while spurring guilt and anxiety.

The most important things teachers should know to help students with ADHD are things that everyone should know. ADHD should be recognized for what it is and not the straw man it’s become. It’s not a harmless quirky personality trait. ADHD isn’t being used as an *excuse* for late assignments and sloppy work, it’s an *explanation*. Identifying ADHD as the impairment means that teachers, parents, and society as a whole can

start making plans that remove barriers to learning just as ramps remove barriers to participation for people with mobility impairments.

There has been discussion about changing the name of ADHD because as twitter user Ada Powers (2019) states:

> ADHD is the most poorly-named affliction ever. like hi do you have a profound physical inability to accomplish your goals specifically because they're your goals and also the thought of your friends not liking you makes you want to die? you may have Trouble Sitting Still Disorder

At this point ADHD might as well be "Trouble Sitting Still Disorder" with how pervasive the hyperactive young boy stereotype is. Changing the name could help reduce stigma that is already so tightly bound to ADHD. A rebranding could help in this endeavor as a new name would distance this disorder from its previous stereotypes. Without a renaming it would be more difficult to turn around society's perception of ADHD.

Some would also like to see the word "deficit" omitted in the new name since they see themselves as different—not deficient or "less than". A lot has been discovered about ADHD since it was first named. Primarily, executive functioning is now understood as a major part of ADHD and so some advocate for "executive function disorder" while others propose "attention regulation-deficit disorder" (Matteson, 2017). The latter still includes "deficit" however, this name is not saying there is a lack of attention but rather a lack of control over it.

Within the social sphere of change, the biggest obstacle is education about what ADHD is and what that means for people living with the disorder. A starting place would be to stop minimizing the struggles those with ADHD have to face. While most people

may experience some ADHD-like symptoms every once in a while, they don't interfere with day-to-day life and are within the typical range of experiences. People with ADHD experience these symptoms more frequently and more severely than what's typical, causing significant impairment and distress.

ADHD needs to be taken more seriously by society. Just as depression isn't merely being sad and anxiety isn't only worry, ADHD isn't just hyperactivity. People with ADHD are often treated with contempt because they are seen as lazy and not willing to try, or they are pitied because they are seen as a victim of ADHD. Attitudes surrounding ADHD are mostly driven by a misunderstanding and misrepresentation of what ADHD is. ADHD doesn't need more awareness, people know the name, it needs more advocacy and education.

References

Alex, S [@blaquemariquita]. (2021, December 22). I rlly do hate that adhd has turned into this quirky trait that makes u dance crazy or get *cutely [Tweet]. Twitter. https://twitter.com/blaquemariquita/status/1473487058501001223

American Psychiatric Association. (2013). Neurodevelopmental disorders. In *Diagnostic and statistical manual of mental disorders* (5th ed.). doi: 10.1176/appi.books.9780890425596

Centers for Disease Control and Prevention (2021). *Data and statistics about ADHD.* https://www.cdc.gov/ncbddd/adhd/data.html

Chang, Z. Lichtenstein, P., Halldner, L., D'Onofrio, B., Serlachius, E., Fazel, S., Långström, N., & Larsson, H. (2014). Stimulant ADHD medication and risk for substance abuse. *Journal of Child Psychology and Psychiatry, 55*(8), 878-885. doi: 10.1111/jcpp.12164

Cleveland Clinic. (2016). *Attention Deficit Hyperactivity Disorder (ADHD): Stimulant Therapy.* https://my.clevelandclinic.org/health/treatments/11766-attention-deficit-hyperactivity-disorder-adhd-stimulant-therapy#:~:text=known%20as%20ADHD.-,Stimulants%20are%20an%20effective%20way%20of%20managing%20ADHD%20symptoms%20such,children%20shortly%20after%20starting%20treatment.

Disabled World. (2010, September 10). *Models of Disability: Types and Definitions.* https://www.disabled-world.com/definitions/disability-models.php

Cortese, S. (2020). Pharmacologic treatment of attention deficit hyperactivity disorder. *New England Journal of Medicine, 383*(11), 1050-1056. doi: 10.1056/NEJMra1917069

Cunic, A. (2022, February 4). *What is ADHD Masking?.* verywellmind. https://www.verywellmind.com/what-is-adhd-masking-5200863#:~:text=1,stigmatized%2C%20or%20feel%20more%20accepted.

Epstein, J. N., & Loren, R. E. A. (2013). Changes in the definition of ADHD in DSM-5: Subtle but important. *Neuropsychiatry, 3*(5), 455-458. doi: 10.2217/npy.13.59

Finkelstein, V. (1975). *Fundamental Principles of Disability*. Union of the Physically Impaired Against Segregation. https://disability-studies.leeds.ac.uk/wp-content/uploads/sites/40/library/finkelstein-UPIAS-Principles-2.pdf

Ford-Jones, P. C. (2015). Misdiagnosis of attention deficit hyperactivity disorder: 'Normal behaviour' and relative maturity. *Paediatrics & Child Health*, *20*(4), 200–202. doi: 10.1093/pch/20.4.200

Ginsberg, Y., Quintero, J., Anand, E., Casillas, M., & Upadhyaya, H. P. (2014). Underdiagnosis of attention-deficit/hyperactivity disorder in adult patients: A review of the literature. *The Primary Care Companion for CNS Disorders, 16*(3). doi: 10.4088/PCC.13r01600

Grothe, M. (n.d.). Dr. Mardy's Dictionary of Metaphorical Quotations. drmardy. Retrieved June 6, 2022, from https://www.drmardy.com/dmdmq/a

Hartmann, T. (1993). *Attention deficit disorder: A different perception*. Underwood Books Grass Valley, CA:

Katzman, M. A., Bilkey, T. S., Chokka, P. R., Fallu, A., & Klassen, L. J. (2017). Adult ADHD and comorbid disorders: Clinical implications of a dimensional approach. *BMC Psychiatry, 17*(302). doi: 10.1186/s12888-017-1463-3

Lange, K. W., Reichl, S., Lange, K. M., Tucha, L., & Tucha, O. (2010). The history of deficit hyperactivity disorder. *ADHD Attention Deficit and Hyperactivity Disorders*, *2*, 241-255. doi: 10.1007/s12402-010-0045-8

Matteson, N. (2017, October 31). *Would Renaming ADHD Better Describe the Disorder?,* HealthyPlace. Retrieved on 2022, June 6 from https://www.healthyplace.com/blogs/livingwithadultadhd/2017/10/is-there-a-better-name-for-adhd

Montes, L. G. A., García, A. O. H., & Ricardo-Garcell, J. (2007). ADHD prevalence in adult outpatients with nonpsychotic psychiatric illnesses. *Journal of Attention Disorders, 11*(2), 150-6. doi: 10.1177/1087054707304428

pizzaforpresident (n.d.) I went to a party once and everyone was supposed to pitch in some money to buy adderall. I had. [Blog post]. *Tumblr.*

Powers, A [mspowahs]. (2019, February 6). ADHD is the most poorly-named affliction ever. like hi do you have a profound physical inability to accomplish your goals [Tweet}. Twitter. https://twitter.com/mspowahs/status/1093267522969694208

Quinn, P. D., Chang, Z., Hur, K., Gibbons, R. D., Lahey, B. B., Rickert, M. E., Sjölander A., Lichtenstein, P. Larsson, H., & D'Onofrio, B. M. (2017). ADHD medication and substance-related problems. *American Journal of Psychiatry, 174*(9), 877-885. doi: 10.1176/appi.ajp.2017.16060686

Ramtekkar, U. P., Reiersen, A. M., Todorov, A. A., & Todd, R. D. (2010). Sex and age differences in attention-deficit/hyperactivity disorder symptoms and diagnoses: Implications for DSM-V and ICD-11. *Journal of the American Academy Child & Adolescent Psychiatry, 49*(3), 217–228. doi: 10.1016/j.jaac.2009.11.011

Sergeant, J. A., Geurts, H., Huijbregts, S,. Scheres, A., & Oosterlaan, J. (2003). The top and the bottom of ADHD: a neuropsychological perspective. *Neuroscience and Biobehavioral Reviews, 27*(7), 583-592. doi:10.1016/j.neubiorev.2003.08.004

Simon V., Czobor, P., Bálint, S., Mészáros, A., & Bitter, I. (2009). Prevalence and correlates of adult attention-deficit hyperactivity disorder: meta-analysis. *The British Journal of Psychiatry, 194*(3), 204-11. doi: 10.1192/bjp.bp.107.048827

Watters, C., Adamis, D., McNicholas, F. & Gavin, B. (2017). The impact of attention deficit hyperactivity disorder (ADHD) in adulthood: A qualitative study. *Irish Journal of Psychological Medicine, 35*, 173–179. doi:10.1017/ipm.2017.21

Webster, N. (2018). *ADHD in adulthood: A qualitative study of lived experience, selfesteem, diagnosis and service provision in the UK.* ResearchGate. https://www.researchgate.net/publication/326960440_ADHD_in_adulthood_A_qualitative_study_of_lived_experience_self-esteem_diagnosis_and_service_provision_in_the_UK

Weissenberger, S., Schonova, K., Büttiker, P., Fazio, R., Vnukova, M., Stefano, G. B., & Ptacek, R. (2021). Time perception is a focal symptom of attention deficit/hyperactivity disorder in adults. *Medical Science Monitor, 27*:e933766. doi: 10.12659/MSM.933766

Wolpert, S. (2013, May 29). Are children who take Ritalin for ADHD at greater risk of future drug abuse?. UCLA Newsroom. https://newsroom.ucla.edu/releases/are-children-who-take-ritalin-246186

Appendix

ADHD Diagnostic Criteria A

Type	Criteria
ADHD-I	a. Often fails to give close attention to details or makes careless mistakes in schoolwork, at work, or during other activities (e.g., overlooks or misses details, work is inaccurate)
	b. Often has difficulty sustaining attention in tasks or play activities (e.g., has difficulty remaining focused during lectures, conversations, or lengthy reading)
	c. Often does not seem to listen when spoken to directly (e.g., mind seems elsewhere, even in the absence of any obvious distraction)
	d. Often does not follow through on instructions and fails to finish schoolwork, chores, or duties in the workplace (e.g., starts tasks but quickly loses focus and is easily sidetracked)
	e. Often has difficulty organizing tasks and activities (e.g., difficulty managing sequential tasks; difficulty keeping materials and belongings in order; messy, disorganized work; has poor time management; fails to meet deadlines)
	f. Often avoids, dislikes, or is reluctant to engage in tasks that require sustained mental effort (e.g., schoolwork or homework; for older adolescents and adults, preparing reports, completing forms, reviewing lengthy papers).
	g. Often loses things necessary for tasks or activities (e.g., school materials, pencils, books, tools, wallets, keys, paperwork, eyeglasses, mobile telephones)
	h. Is often easily distracted by extraneous stimuli (for older adolescents and adults, may include unrelated thoughts)
	i. Is often forgetful in daily activities (e.g., doing chores, running errands; for older adolescents and adults, returning calls, paying bills, keeping appointments)
ADHD-H	a. Often fidgets with or taps hands or feet or squirms in seat
	b. Often leaves seat in situations when remaining seated is expected (e.g., leaves his or her place in the classroom, in the office or other workplace, or in other situations that require remaining in place)
	c. Often runs about or climbs in situations where it is inappropriate. (Note: In adolescents or adults, may be limited to feeling restless)

Type	Criteria
ADHD-H	d. Often unable to play or engage in leisure activities quietly
(cont.)	e. Is often “on the go”, acting as if “driven by a motor” (e.g., is unable to be or uncomfortable being still for extended time, as in restaurants, meetings; may be experienced by others as being restless or difficult to keep up with)
	f. Often talks excessively
	g. Often blurts out an answer before a question has been completed (e.g., completes people’s sentences; cannot wait for turn in conversation)
	h. Often has difficulty waiting his or her turn (e.g., while waiting in line)
	i. Often interrupts or intrudes on others (e.g., butts into conversations, games, or activities; may start using other people’s things without asking or receiving permission; for adolescents and adults, may intrude into or take over what others are doing)

Note. DSM-V ADHD diagnostic criteria A. If six symptoms—five for those >16 years old—are met in both sections then a diagnosis of ADHD-C can be made.