



**University of  
Nottingham**

UK | CHINA | MALAYSIA

**Misconceptions of neurodivergence in a neurotypical  
society:**

**An exploration and critical analysis of social perceptions  
and attitudes toward autistic individuals**

20287220

LIBA3003: Liberal Arts Dissertation

## **Abstract**

This dissertation explores and critically analyses society's misconceptions of neurodivergence. Focusing on autistic individuals and stimming specifically, this dissertation investigates societal social perceptions and attitudes toward individuals and behaviour that deviate from the neurotypical norm. Utilising a questionnaire with quantitative and qualitative questions, this dissertation recorded participants' perceptions and attitudes, finding that there is still a significant stigma and misunderstanding surrounding autism. This has a myriad of detrimental effects for the autistic individual. As a result, this dissertation proposes that autism acceptance training (AAT) should be made mandatory in school curriculums and workplace EDI initiatives, as part of a wider neurodivergence acceptance training. This assertion has been reinforced by a wide range of contemporary and pre-existing literature, as reflected in the included literature review. The dissertation concludes that deficit-based, medical-model interventions lack the care and nuance that the social intervention AAT provides. Therefore, mandatory AAT, as part of neurodivergence acceptance training, would make autistic people's social environments more comfortable and inclusive, improving their quality of life.

# Table of Contents

ACKNOWLEDGEMENTS .....	4
<b>INTRODUCTION .....</b>	<b>4</b>
<b>CHAPTER 1: LITERATURE REVIEW .....</b>	<b>5</b>
1.1 NEURODIVERGENCE AND ASD .....	6
1.2 STIMMING .....	7
1.3 EXPLAINING MISCONCEPTIONS AND REACTIONS TO STIMMING .....	8
1.4 STIGMA.....	8
1.5 MASKING .....	9
1.6 THE ‘DOUBLE EMPATHY PROBLEM’ .....	10
1.7 MODELS OF DISABILITY.....	11
1.8 INTERVENTIONS.....	11
1.9 AUTISM ACCEPTANCE .....	13
1.10 AUTISM ACCEPTANCE TRAINING (AAT).....	13
<b>CHAPTER 2: RESEARCH FINDINGS AND ANALYSIS .....</b>	<b>14</b>
2.1 INTRODUCTION.....	14
2.2 METHODOLOGY.....	15
2.3 PERCEPTIONS OF KNOWLEDGE .....	17
2.3.1 COMMON MISCONCEPTIONS .....	18
2.4 FAMILIARITY AND BEHAVIOURAL RESPONSES .....	20
2.4.1 FIDGETING .....	20
2.4.2 VOCAL STIMMING .....	21
2.4.3 PHYSICAL STIMMING .....	22
2.4.4 COMPARING STIMMING TYPES.....	23
2.5 TRAINING AND ACCEPTANCE .....	24
2.5.1 OPINIONS OF TRAINING .....	24
2.5.2 EXAMINATION OF TRAINING.....	25
<b>CONCLUSION.....</b>	<b>28</b>
<b>BIBLIOGRAPHY .....</b>	<b>29</b>
<b>APPENDIX I : QUALITATIVE ANSWERS.....</b>	<b>43</b>

## **Acknowledgements**

This endeavour would not have been possible without my supervisor and personal tutor, Kim Lockwood, who has shown be the highest level of compassionate support throughout my three years at the University of Nottingham.

Words cannot express my gratitude to my family, especially my mum Kim Sampson, dad Andrew Sampson, and brother Jose Sampson. Their continuous care, encouragement, and belief in me means more to me than they could ever know.

I am also thankful for my partner Harry Ash, who's kindness, humour and spirit kept me going during difficult days.

## **Introduction**

Social perceptions refer to how people form opinions and inferences about people based on their observations and evaluation of others' body movements, intentions, attitudes, and values (1,2), whereas attitudes are positive or negative feelings towards certain people, objects, or issues (3). As this project is exploring social perceptions and attitudes from a mixed demographic, it enables the societal norm to be explored. Societal norms in a neurocognitive context refer to the range of selective neurocognitive functions that society regards as normal for a given age and are influenced by context and culture. They are not objective, statistical facts but are standards established and upheld by socio-political mechanisms. Regarding neurocognitive functioning, neurotypicals' cognitive profile correlates with the established societal norm, and therefore benefits from epistemic power and cognitive privilege, which neurodivergent individuals are not able to access (4,5). Utilising a questionnaire with quantitative and qualitative questions, this study will investigate how people understand and perceive autism spectrum disorder (ASD) as a condition and associated behaviours, whilst also considering neurodivergence more broadly. This will elucidate the reality of being neurodivergent, as any stereotypical judgements will be made apparent, therefore displaying whether there is a need for systemic change regarding interventions. Both the social and medical model of disability will be considered, with the project advocating for the social intervention of autism acceptance training, as part of a wider neurodivergence awareness initiative. Regarding structure, this project starts with Chapter 1: Literature Review, including subsections on ASD, stimming, misconceptions, stigma, masking, double empathy problem, interventions, and autism acceptance training. Following this, Chapter 2: Research findings and analysis will include a methodology, perceptions of knowledge, familiarity and behavioural responses, and training and acceptance, concluding with a paragraph summarising the project.

## **Chapter 1: Literature Review**

## 1.1 Neurodivergence and ASD

This project utilises a variance of psychological terms, which need defining to guarantee the correct understanding of the purpose of this project. The term 'neurodivergent' refers to individuals who have selective neurocognitive functions or neurodevelopmental differences that lie outside prominent norms of society, yet they may not actually have a neurodevelopmental disorder. 'Neurotypical' is the opposite of this term, whereby it relates to individuals whose selective neurocognitive functioning remains within societal norms. Autism spectrum disorder (ASD) falls into the category of neurodivergence, as it is a lifelong neurodevelopmental condition, despite the misconception that it only occurs in childhood. When discussing ASD, one must respect the importance of language used when referring to individuals with ASD. Contextually, 'autistic person' is preferred by those on the spectrum, whereas the research community utilises person-first language like 'person with autism' (6-9). This project will utilise the term 'autistic person', as this is the most preferred by those with ASD, as identity-first language foregrounds how the strengths and difficulties related to autism are central to autistic individuals' identity (10-13). Approximately 1% of the population is autistic, with most being adults, with it being possible to diagnose before the age of 2 (14). Early diagnosis and intervention are essential for enhanced outcomes for autistic people, yet many remain undiagnosed due to misdiagnosis and limited access to services (15,16). Furthermore, the terms 'neurotypical', 'allistic' and 'non-autistic' will be used interchangeably to specifically refer to those who are not autistic (17-20).

ASD is highly heterogenous, hence the term 'spectrum', with individuals experiencing various presentations of the following diagnostic features: differences in social interactions and communication, restricted, repetitive behaviours (RRB) and interests, a need for sameness, and atypical sensory processing. These features must have been present in early development (first 3 years), causing clinically significant impacts on social, occupational, and other important areas of functioning, as well as not being able to be explained by a different diagnosis (21,22). Autistic individuals exhibit varying combinations of strengths and difficulties that can differ over time, with some having co-occurring intellectual difficulties (23,24).

## 1.2 Stimming

Recently, increased advocacy amongst ASD individuals have called for RRBs to be defended, with these self-stimulating behaviours being reclaimed and colloquially referred to as 'stimming'. Stimming has been described in autistic people with and without intellectual difficulties, with its intensity correlating with anxiety and severity of ASD characteristics (25-27). It can be expressed through non-goal directed, patterned motor movements such as hand or arm flapping, body rocking, spinning, head-banging, and hair pulling, and vocalisations such as repeating sounds or phrases, shouting, squealing, singing, and whistling. In addition, excessive fidgeting, or repetitive use, or aligning of, an object can also be considered stimming (8,21,24,28-32).

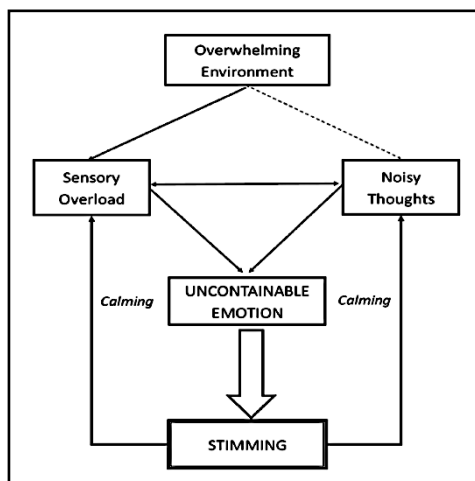


Fig.1: Stimming to self-regulate (31)

Theoretical understanding of stimming proposes that it has a variable sensorimotor basis; excessive, insufficient, and inefficient sensory processing causes these self-stimulatory behaviours (33). To elaborate, stimming may offer familiar, dependable, autogenous feedback in response to struggling with new, unpredictable, and overstimulating circumstances (34-39). In this way, stimming enables individuals to better cope with not only overwhelming sensory stimulation, but also excessive emotional excitation, dysregulated or distracted thoughts, by maintaining a feeling of internal balance (Fig.1). It can express both positive and negative emotions such as excitement, uncertainty, happiness, and anxiety, whilst also allowing one to regulate cognitive processes, through organising their thoughts and aiding concentration by distraction from sensory or emotional overload (29, 40-44). Overall, this self-regulatory mechanism has been positively described by autistic individuals to be an essential, comforting tool in assisting them cope with, and regulate their environment, sensory perceptions, thoughts, and emotions (31,45,46).

### 1.3 Explaining Misconceptions and Reactions to Stimming

Autistic people have social, behavioural, and communicative differences that result in neurotypicals struggling to read them, misperceiving behaviours like stimming, and consequentially leading to neurotypicals negatively rating autistic people. Sasson, et al. (2017) (47) explored thin-slice judgments (first impressions), where non-autistic undergraduates rated images randomly sampled from videos of autistic and non-autistic people interacting, concluding that non-autistic people rate autistic people less socially favourable. Non-autistic raters rated audio and/or visual information, not speech content, implying the autistic individuals' social presentation style drove negative ratings, not the content of their social speech (48-54). This may be because there is no shared understanding of autistic people's behaviours like stimming, resulting in neurotypical people assigning their own meaning to these behaviours, misinterpreting an autistic person's mental state and intentions. For example, some controversial portrayals of autistic individuals conveyed through demeaning and dehumanising metaphorical language are that they have a loss of personhood, retreat into an empty fortress, and are locked inside a shell (55-58).

Many autistic individuals describe their stimming being viewed negatively by others and not socially accepted, with negative responses being both explicit (negative comments) and implicit (staring or moving away) (29,31,45). Regarding explicit responses, Steward's (2015) (46) study of 100 autistic adults showing that 72% of people had been told not to stim at some point in their life. Negative responses result in preferred stims being replaced with substitute stims deemed less obvious and more socially acceptable. Stims are also suppressed in public and private, or until alone or with those they trust. Furthermore, substitute stims are reportedly difficult to maintain and less effective in self-regulation than preferred stims, contributing to feelings of rejection, shame, and frustration. It also takes high cognitive effort to suppress, and substitute stims, reducing concentration and available cognitive resources.

### 1.4 Stigma



Negative attitudes toward autistic people and their behaviour can be elucidated by stigma-related beliefs of non-autistic observers, instead of autistic characteristics or social skills of autistic individuals themselves (59-61). Stigma is a multifaceted construct that is conceived through the identification and labelling of differences linked to a stereotype that has negative features, resulting in an 'in-group' and 'outgroup' scenario. It is often embedded in conscious or unconscious ableist beliefs, viewing those with disabilities as less worthy of respect, and less able to participate and contribute to society (62-71). Autistic people have shown to be at particularly high-risk encountering stigma related to their condition, even in comparison to other disability groups, with autistic people even sometimes holding internalised stigma against other autistic individuals (72-75). Stigma that has been perceived or encountered towards ASD has been reported by autistic individuals in the UK (76), the US (77) as well as internationally by parents of autistic people (71,78,79). The media plays a part in the stigmatisation of ASD, often narrowly portraying autistic individuals as anti-social, lacking empathy or with savant abilities, accentuating inaccurate stereotypes and therefore promoting the perpetual judgment and discrimination experienced in the autistic community (80-84).

This stigma against ASD, alongside negative first impressions, may invoke avoidance and unfriendly responses, leading to social exclusion by non-autistic people (85-87). It may also reduce a neurotypical individual's willingness to develop a social relationship, despite autistic people strongly desiring reciprocated friendships and romantic relationships, resulting in smaller social networks and fewer social relationships than allistic adults (52,88-94). These unfulfilled social needs result in higher rates of loneliness, victimisation, bullying and depression, significantly decreasing quality of life and mental wellbeing, whilst affecting the allocation of funding for appropriate support services (71,73,75,95-107).

## 1.5 Masking

Out of fear of negative judgment and perceived stigma of their ASD, autistic people may attempt to 'mask' or 'camouflage' ASD characteristics to try and fit into the non-autistic world. Camouflaging refers to learning how to act in different social situations,

involving strategies such as mimicking non-autistic people's behaviour, conversation style, tone, mannerisms, and body language to navigate everyday social situations (77,108-113). Interestingly, autistic women may be more socially motivated and successful in masking their autistic behaviour and characteristics due to gendered societal expectations, resulting in a greater risk of being misdiagnosed and remaining undiagnosed in clinical practice (87,110-112,114-122). Moreover, masking has been shown to be detrimental for autistic people's mental health, with the camouflaging strategies resulting in stress and exhaustion, whilst also correlating with anxiety, depression, poor self-image, and suicidality (29,43,108,113,123-127). Evidently, autistic behaviours need to be accepted to ensure that masking does not take place, reducing all these negative side effects.

## 1.6 The 'Double Empathy Problem'

Neurotypicals' negative ratings of autistic people supports the 'double empathy problem' (DEP) framework of ASD; when people with extremely different life experiences and understanding of the world interact, they struggle to empathise, which is exacerbated through differing language use and comprehension (128,129). The DEP can be applied to the bidirectional difficulty in communication and understanding between autistic and neurotypical individuals, as just as autistic adults struggle to decode neurotypicals' mental and emotional states, neurotypicals have difficulty understanding the emotions and perspectives of autistic individuals. These mutual failings in reciprocity, intersubjectivity and understanding between autistic and neurotypical individuals, confronts and challenges the notion that it is due to a 'deficit' in autistic individuals. It is neither solely the problem of the autistic or allistic person, but because of the misunderstanding found within the space between the two interlocutors. The discrepancy between neurocognitive capacities and social affordances of neurotypical and neurodivergent individuals makes it a mutual, relational issue (4,47,59,60,61,63,130-143). The conflicting viewpoints on the cause of misunderstanding in communication between autistic and allistic people aligns with the opposing social and medical models of disability.

## 1.7 Models of Disability

Medical literature currently views ASD through the medical model of disability, shown through the DSM-5's classification of the interpretation of behaviour (144). The medical model views individuals being disabled due to their own deficits and difficulties and historically is the dominant lens through which disabilities are considered. Nevertheless, it is poorly received by disabled communities as its focus on symptom reduction, normalisation, and elimination of conditions can be interpreted as ableist. Ableism relates to disabled and neurodivergent individuals being excluded and considered lesser-valued individuals through complex, oppressive societal norms that critique them when they cannot adhere to able, neurotypical standards. This deficit-based, medical model portrays autistic individuals as ill, broken people who require fixing so they can function normally in society, contrasting with neurotypical people who are regarded as neurologically and psychologically healthy. It ignores the advantageous behaviours, cognitive strengths and diversity of talents associated with ASD (12,13,21,57,145-152).

The social model of disability opposes the medical model, claiming disability arises from social context instead of the individual. Disability arises because of society's inadequate responses to individuals' impairments and differences, instead of pathologically viewing the individual as the sole cause of their disability. Under this model, external factors such as environment and societal structures like systematic barriers, negative attitudes, and lack of accommodation and acceptance are seen to inhibit autistic people functioning optimally (4,12,47,61,108,134,148,151,153-156). It provides a more holistic framework whereby it is society's responsibility to incorporate policies that enable inclusivity of those with diverse neurocognitive profiles. It favours social, cultural, and political inclusion and policies over prevention, eradication, and treatment (4,157), with this project focusing on negative attitudes.

## 1.8 Interventions

Interventions aimed to modify fundamental autistic characteristics are condemned as unneeded and at times abusive (158-161). Such interventions like Applied Behavioural Analysis (ABA) (162), exclusively focus the treatment on the autistic individual themselves, adopting a deficit-model framework aligning with the medical model of disability. ABA involves behavioural learning established on the principles of reinforcement, punishment, extinction, and repetition, fostering learning through repeating targeted behaviours and utilising reinforcers to teach socially normative understanding and behaviours (150,158,159,163). ABA wrongfully encourages the suppression of stimming as a self-regulatory mechanism, removing a tool that enhances autistic wellbeing and mental health (31,148,164-166).

Deficit-focused interventions such as ABA do not result in lasting benefits (167) and encourage the masking of autistic traits and behaviours (168). These rigid interventions resultingly increase internalised stigma (10), contributing to mental-health problems such as depression and anxiety (108,125,169), due to the severe trauma experienced through childhood participation (23,158,159,170). Nevertheless, these therapeutic interventions continue to attempt to 'treat' and control ASD behaviours like stimming despite the lack of strong efficacious and ethical evidence and rejection of their 'ableist' principles by the autistic community (31,135,150,171,172).

One can see that deficit-focused interventions have not resulted in highly positive outcomes for the autistic population. We must therefore move towards adopting the social model of disability as an intervention framework, by focusing on the overwhelming, non-inclusive environment. Kapp, et al.'s (2019) (31) semi-structured interviews and focus-group work with autistic adults demonstrates this; they found the best intervention route is modifying overwhelming environments to prevent stimming, improving other's ASD understanding, and promoting the social acceptance of stimming. Aligning with the social model of disability, it focuses on facilitating true reciprocity that helps allistic people understand and respect stimming, helping autistic people to be more comfortable in society (132,173,174).

## 1.9 Autism Acceptance

Autism acceptance is when an autistic individual feels appreciated as an autistic person. It involves their ASD diagnosis and behaviours like stimming being positively acknowledged and accepted by others and by themselves as an intrinsic part of their identity (45,108). Two attributes contributing to more accepting attitudes toward ASD are autism knowledge and familiarity (64,71,158). Familiarity is when one has a high frequency and quality of personal contact with individuals that have clinical conditions like ASD and is associated with lower levels of stigma towards those specific conditions (175,176). Whereas ASD knowledge consists of high, factual comprehension of ASD with lower tendencies to perpetuate common, problematic misconceptions about autism. Greater ASD knowledge is associated with lower stigma, more positive evaluations of autistic people and better social experiences for autistic people (60,87,113,177-180).

Autism acceptance has been shown to be crucial in mediating autistic individual's self-esteem and mental health, with social support and acceptance being a protective factor against stress in social psychology literature (108,181). For example, autistic individuals with supportive family and friends that accept their ASD develop greater self-worth and fewer mental-health problems (182,183). Regarding 'stimming', neurotypical understanding and acceptance of stims was shown to be positive, liberating and anxiety-reducing as autistic individuals could stim freely and openly without judgement or social pressure forcing them to repress or conceal stims (29,31,45,184).

## 1.10 Autism Acceptance Training (AAT)

Regarding AAT research, Gillespie-Lynch, et al. (2015) (64) implemented an education strategy of online training to college students that increased their understanding and decreased stigmatisation, leading to higher acceptance of their autistic peers. Furthermore, Jones, et al., (2021a) (158) conducted a study comparing participants' level of knowledge and understanding after AAT, mental-health training,

and a no-training control regarding realistic representations (video clips) of autistic people. Overall, they concluded that participants who completed AAT showed fewer misconceptions, lower ASD stigma, higher expectations of autistic functional abilities and expressed more interest in establishing platonic and romantic relationships with autistic people. These findings correlate with previous studies displaying exposure to realistic representations of disabled individuals can reduce negative misconceptions (64,185,186), and that factual information and autistic people's first-person accounts generate greater social interest in both autistic and non-autistic people after a 'get to know you' conversation (159). However, relative to the no-training control, neurotypical participants who completed the mental-health training showed no meaningful differences in stigma and negative attitudes toward ASD, implying that the increased sensitivity and exposure to clinical conditions was inadequate in opposing ASD related stigma. AAT is therefore essential to produce a relational effect in the reduction of stigma in non-autistic people and greater social interest towards autistic individuals.

## **Chapter 2: Research Findings and Analysis**

### **2.1 Introduction**

This chapter introduces the methodology of the project, explaining the process of constructing and distributing the questionnaire, and analysing the results. Research findings and analysis were split up into subsections of perceptions of knowledge, familiarity and behavioural responses, and training and acceptance, to enable a full examination.

## 2.2 Methodology

This study employs a questionnaire investigating both quantitative and qualitative information. Due to time, scale and financial constraints, this method enabled a large population of possible participants to be promptly reached with low effort and financial cost (187). Prior to commencing the study, ethical approval was obtained by the school's ethical approval officer. Furthermore, preliminary questions were put in place to ensure that all participants were 16+ and consented to the storage and analysis of their response data. Project information, a privacy notice and contact details were also provided at the beginning of the survey. The questionnaire was circulated for 4 months, distributed among university group-chats and in the researcher's Facebook home-town community group, allowing for varying ages, gender, occupations, and life experience. Out of 128 participants, 81% were female, 18% were male, <1% was non-binary and <1% preferred not to state their gender. Participants ranged in age from 16-65+, and in occupation status. The choice of not surveying a focus group with certain characteristics like university students, ensured general societal attitudes were examined, not a specific societal group.

Data collection and analysis were carried out using both Microsoft Forms and Microsoft Word. The Microsoft Forms survey consisted of 42 questions: 26 closed quantitative questions and 16 open-ended, qualitative questions. Qualitative questions were optional and were there to enable participants to expand in their own words about their answers regarding their understanding, perceptions, and attitudes of the study area. Utilising both quantitative and qualitative questions resulted in the research framework having both subjective and objective qualities. Quantitative questions enabled quantifiable, verifiable responses to be collected whilst qualitative questions ensured that human experience was explored.

The questionnaire was designed to measure varying constructs. Q2-7 assessed participants' characteristics such as age, gender, education etc, ensuring a mixed demographic. As identified in the literature review, autism acceptance can be

separated into ASD knowledge and familiarity. Research shows that ASD familiarity can improve neurotypicals' ability to understand and accept ASD differences (63,176), with those with an autistic family member being more accepting and open towards autism (188). Despite this, the questionnaire primarily investigated participants' knowledge, exploring how their perceived knowledge correlates with their actual knowledge. Q8-13 elicited information surrounding participants' knowledge and understanding with neurodivergence, whereas Q14-19 and Q31-33 extracted participants' ASD knowledge and understanding. Through the analysis of qualitative answers in Q9,11,13,15,19,33, participants demonstrated whether they knew and understood the definitions they previously said they could explain. Participants were questioned on their reactions to ASD behaviour when directly exposed to it, examining whether qualitative responses coincided with levels of perceived and actual knowledge. Participants were asked whether they had seen the 3 stimming types: physical, vocal, and excessive fidgeting in Q20,23,26, enabling varying responses to specific stims to be considered and analysed. They were then asked to best describe their feelings as 'accepting', 'indifferent', 'uncomfortable', or 'other' in Q21,24,27, and qualitatively explain their reactions in Q22,25,28. This allowed perception and attitudes to real-life representations of neurodivergent behaviour to be analysed. Participants were also questioned whether they had ever received acceptance training or education on autism, neurodivergence or mental health, what topics were involved if they had, and whether they would like to if they had not. This enabled links to be made between perceived and actual knowledge, and whether they had been professionally trained in these areas. It extended Jones et al.'s (2021a) (158) exploration of ASD knowledge after ASD training, mental-health training, and a no-training control by incorporating a neurodivergence training element.

Overall, this self-report approach captured the complexities of participants' perceptions and attitudes toward neurodivergent behaviour, as it was more valid than simply observing participants behaviour due to participants explicitly describing their thoughts and feelings. Furthermore, due to the guarantee of confidentiality and anonymity for respondents during data collection, it ensured sensitive information was protected. This generated the opportunity for more truthful responses as it helped control for, but not eliminate, social desirability bias (189,190). The questionnaire was made up of socially sensitive questions, which Dovidio, et al. (1997) (191) state often



results in participants changing their answers to what they deem socially acceptable. Participants evidenced this phenomenon, with some stating they felt a negative reaction but expressed how they 'knew' they should not. Due to the nature of participants having to explicitly state their attitudes toward ASD through the self-report measure of a questionnaire, actual levels of stigma were always going to be underestimated (192,193). This result has been replicated through previous studies, showing that despite measures of explicit biases towards ASD under-reporting stigma (194), implicit biases persist among participants that showed no explicit biases. The influence of social desirability controlled explicit biases (55,195,196), whereas implicit biases were exhibited through unconscious responses that showed problematic misconceptions (158,197).

## 2.3 Perceptions of Knowledge

Self-evaluation questions were utilised in the survey to assess participants' perceived knowledge of ASD. 80% of participants knew what ASD is (Q14), but only 55% could explain the condition (Q32), and only 25% felt confident in doing so (Q18). This demonstrates that participants have a strong perception of their own knowledge but do not have the self-assurance to explain it. This is foregrounded by some stating they 'understand but can't explain' ASD (Q32), but one must question whether they truly do understand ASD if they cannot explain it. The survey results correlate with previous studies observing self-reported perceived, and objectively measured, actual ASD, knowledge; McMahon et al. (2020) (198) found non-autistic people often inadequately judge their level of ASD knowledge, with those with the least ASD knowledge overestimating their knowledge the most, and those with the most knowledge underestimating themselves the most. The least knowledgeable individuals are often unaware of their own ignorance, failing to recognise their misconceptions about ASD. This is particularly problematic when these individuals act in a key support role for an autistic person (158,199,200).

Despite 80% of people saying they know what ASD is, the survey results demonstrate how very few people know the correct definition. When asked to explain what autism

is (Q15), no participants managed to accurately give a full description of the condition as explicated in the literature review; diagnostic criteria for autism includes differences in social interactions and communication, restricted, repetitive behaviours (RRB) and interests, a need for sameness, and atypical sensory processing (21). Many included some correct diagnostic features in their answers yet only 20% managed to provide an answer without any incorrect information or stereotypical language or misconceptions. One can see that the distinction between ASD and neurodivergence needs to be established in the general population. Furthermore, by utilising qualitative answers from all three questions (Q15,19,33), one can establish a richer analysis of participants' misunderstanding of ASD. The following responses to Q15, 19, 33, foreground how non-autistic people can be aware of autism, yet misconceptions and misunderstanding remain common (108,201,202).

### 2.3.1 Common Misconceptions

Some participants' answers perpetuated the harmful misconception that autistic people have a 'lack of emotions', 'empathy', and 'emotional attachment', with it being 'hard or impossible to make an emotional connection'. This demonstrates the DEP and stigma explored in the literature review (128,129), whereby non-autistic and autistic people struggle to communicate efficiently. From an autistic individual's perspective, neurotypicals lack empathy for autistic life experiences, foregrounding the misunderstanding between the two interlocutors as neurotypicals misinterpret autistic communication styles (131,203). As seen here, they can interpret autistic emotional expression as not having emotions at all, due to the different way they have at processing and showing them.

Another fallacious idea that a participant mentioned is that autism is 'greater with boys as girls naturally seem to have better skills in interaction', which is incorrect, yet reflects the under-diagnosis and misdiagnosis of women discussed in the literature review (117,118). To contextualise this statement, autistic women have been found to be more successful in masking their autism due to gendered societal expectations,

appearing more social competent yet enduring the same social difficulties as autistic men (87,112,119).

Some also described autistic individuals with explicitly stigmatised language, stating that they were 'offkey', 'socially inept', potentially referring to how ASD involves differences in social interactions and communication (21). As demonstrated here, behaviours which deviate from social norms are viewed negatively, even if they are attributable to ASD.

Furthermore, some participants demonstrated poor ASD knowledge by revealing profoundly incorrect ideas about ASD. For example, ASD is apparently 'someone with behaviour problems', 'behavioural issues', 'selfish behaviour', and who is 'unable to rationalise behaviour', pejoratively describing autistic individuals' behaviour, rather than understanding their differing behaviour is due to neurodivergence. This is because there is no shared understanding of ASD behaviours like stimming as mentioned in the literature review, leading to neurotypical people creating their own meaning of autistic gestures and consequently misinterpreting an autistic person's mental state and intentions (4). One can see how problematic and damaging these views of autism are, and how they align with non-autistic people's stigma-related beliefs causing negative social favourability ratings of autistic people (59-61).

Additionally, some participants stated that ASD was 'OCD', and that autistic people were 'anxious/worried', erroneously associating ASD with mental-health problems. Whilst autistic individuals can have co-morbid mental-health problems (102,123,124), ASD features are not mental-health symptoms. One could argue that by 'OCD', the participant was equating ASD's repetitive behaviours (RRB) and interests, and a need for sameness (21) with obsessive compulsive disorder (OCD) symptomology.

Moreover, one participant was assumptive of the status of the researcher in their neurodivergence or lack of, stating that autistic people's 'perception and reactions to the world is different to me and you'. The participant assumes that they, and the researcher are neurotypical, further emphasising how people think that neurotypicality is the norm. It also demonstrates implicit bias as they imply autistic people do not belong in academia or are able to conduct research.

## 2.4 Familiarity and Behavioural Responses

### 2.4.1 Fidgeting

Regarding fidgeting, 89% of participants stated that they had witnessed excessive fidgeting or repetitive use of an object like a fidget spinner in public (Q20). 69% of participants felt 'accepting', 22% felt 'indifferent', 4% felt 'uncomfortable', and 3% responded 'other' regarding fidgeting (Q21). Several thematic issues were identified when participants explained their responses, many relating to lack of knowledge and understanding (Q22).

Some used problematic language despite good intentions; 'we all have our foibles' alludes to accepting people for who they are, yet 'foible' refers to a minor weakness or eccentricity in one's character, constructing a negative tone toward ASD. Furthermore, a participant said they 'felt sorry for them, but also curious to what was wrong with them', with the adjective 'wrong' creating doubt over their empathetic intentions.

One participant described their past and current self's reactions saying, 'I used to be uncomfortable but the more educated I am the easier it is to spot and more accepting I am of it', foregrounding how education about conditions can reduce stigma (64).

Another stated how 'you may want them to stop but know they can't/don't know they are doing it', exhibiting the neurotypical discomfort with neurodivergent behaviour that may cause an autistic person to suppress or substitute their stimming (46).

Furthermore, there is qualitative evidence of social desirability bias; a participant stated, 'one has to be accepting of other's afflictions and try to accept, understand and support them in the best way one is able to' (189,190). The phrase 'has to' implies

obligation, suggesting implicit bias may remain despite no explicitly stigmatised response shown to appear socially acceptable.

Moreover, one participant stated that it 'doesn't impact' them unless it is 'loud or an irritating noise', demonstrating how less overt stims like fidgeting are more socially acceptable than vocal or physical stims.

## 2.4.2 Vocal Stimming

Regarding vocal stimming, 77% of participants stated they had previously witnessed individuals in public repeating sounds or phrases (said by others, film/TV quotes, made up) or loudly shouting, squealing, or groaning (Q23). 63% of participants felt 'accepting', 16% felt 'indifferent', 12% felt 'uncomfortable', and 8% responded 'other' regarding vocal stimming (Q24). When explaining reactions further, many concepts corresponded with those that arose about fidgeting yet were more stigmatised (Q25).

Some expressed irritation, stating that it was 'sometimes annoying' and 'uncomfortable', demonstrating a low tolerance for behaviours that do not correspond with societal norms. Moreover, some conveyed feelings of fear, stating they were 'feeling alarmed and frightened of loud screams and shouts' and 'worried they may be aggressive'. Another stated it 'feels a bit out of control', implying behaviour is only 'in control' when it is socially normative. Furthermore, some felt unsure on what to do in response, stating they 'don't know whether to look or avoid looking' and that they are 'not understanding why this is happening', highlighting how essential training would be to teach people how to appropriately react.

Others exhibited 'concern' for the individual, stating they 'felt sad for what they, and their family were going through', indicating a level of empathy. Yet one participant simply stated they felt 'sympathetic towards the carer' yet did not mention the individual executing the behaviours, thereby dehumanising the individual and excluding them.

Other qualitative answers correlate with 16% of people feeling 'indifferent'; some were unbothered by the behaviour if it did not affect them directly, with many describing how they 'try to ignore or not react' to the individual. Although this implies they do not wish to draw attention to the individual and make them uncomfortable, ignoring people is not necessarily accepting them as it exacerbates exclusion. Instead, people should 'acknowledge behaviour' but 'not stare or make this obvious' like one participant did, as this does not disregard the individual's existence yet endeavours to establish a comfortable environment for them.

### 2.4.3 Physical Stimming

Regarding physical stimming, 73% of participants stated they had previously witnessed physical behaviours such as head-banging, body rocking, arm, or hand flapping (Q26). 63% of participants felt 'accepting', 18% felt 'indifferent', 17% felt 'uncomfortable', and 3% responded 'other' regarding physical stimming (Q27). Similar concepts to vocal stimming were raised when participants explained their reactions (Q28).

Some expressed discomfort, commenting it 'feels awkward and alien to me' with one participant feeling 'internally a bit alarmed and frightened'. This foregrounds the need for realistic representations of autistic individuals, as when faced with neurodivergent behaviour, neurotypical people can react with fear due to unfamiliarity of it (64,150,185,186).

Furthermore, one participant stated it 'can't be helped' and that it is 'not the fault of the individual'. Despite the apparent good intentions meant through this statement, it implicitly constructs a narrative of blame by utilising the word 'fault', perpetuating negative views.

One participant said they 'felt sorry for the mother dealing with this and how people stare and pass comment, thinking it's bad behaviour or bad parenting', yet one could argue their sympathy is misdirected as they dehumanise the individual executing this behaviour. Another problematically stated they 'feel sad that people are still having to live like this' and that 'medically nothing can be done to rewire their brains', indicating a controversial level of ableism. 'Rewire their brains' demonstrates a complete lack of acceptance of neurocognitive differences, implying the neurodivergent individual must change to adhere to neurotypical norms.

However, some conveyed a sense of sympathy, stating they were 'saddened that the individual is struggling', displaying a caring attitude. Some also expressed 'concern', in that they were 'worried' they may 'hurt' or 'harm' themselves, demonstrating the need for training to provide reassurance, and understanding when faced with stimming behaviours.

Interestingly, one participant commented on their experience as a caretaker during a situation like the examples described, and 'found that other people aren't as tolerant and can be very rude' to them and their clients to and that people have 'even laughed'. This demonstrates blatant stigma towards the individual with ASD and supports studies investigating negative perceptions in the literature review (29,31,45).

#### 2.4.4 Comparing Stimming Types

Quantitative questionnaire data supported current research showing more overt stims such as vocal and physical stims can be suppressed or substituted into less obvious and more socially acceptable stims such as fidgeting, leading to lower levels of successful self-regulation, concentration and higher levels of shame, rejection, and frustration (29,31,43,46). This is shown through 89% of participants having witnessed excessive fidgeting in public, yet 77% participants witnessed vocal stims and 73% of participants witnessed physical stims. Moreover, despite similar percentages of participants stated they were accepting of the three stimming types (69% for fidgeting, 63% for vocal and 63% for physical), significantly more people were 'uncomfortable' with physical and vocal stims than they were excessive fidgeting (4% were

uncomfortable with excessive fidgeting, 12% with vocal, and 17% with physical). Qualitative evidence evidenced how participants did not have the same, or as many negative feelings in response to fidgeting as they did to vocal and physical stimming. This aligns with Kapp, et al.'s (2019) (31) findings, co-produced by autistic self-advocates as well as non-autistic researchers, in that their participants described others responding to their stimming with feelings of annoyance, stress, and alarm, viewing them as strange, aggressive, or ridiculous. This project's questionnaire results supplements Kapp, et al.'s (31) discoveries, in that their study was the first in-depth examination of stimming from the perspective of autistic people, whereas this project explores attitudes towards stimming from a societal perspective, therefore corroborating their conclusions.

## 2.5 Training and Acceptance

### 2.5.1 Opinions of Training

When asked whether they had received some sort of ASD training (Q37), 28% participants said they had and 72% said they had not. 75% people said they would like to receive training if they had not done so already, giving varying reasons why.

Participants described wanting to know what to do during unfamiliar stimming situations. They expressed wanting to 'understand and potentially help', to 'be better informed', as when faced with physical stimming in particular participants felt 'helpless' and 'concerned' that their 'reaction may be inappropriate', demonstrating the need for clarification on whether to intervene and how to react. Furthermore, some expressed they were not 'entirely sure what ASD is' and wanted a 'better', more comprehensive 'understanding'. These statements align with the social model of disability, ensuring that autistic people have a comfortable social environment where they feel they can stim openly without judgement as society would be more understanding and knowledgeable about their condition (31,132,173,174).



Participants also mentioned the necessity for different settings to implement training and education, stating that they 'think it's something that especially workplace setting should be aware of' and that 'all schools should teach it'. This accentuates the project's premise of the need to administer neurodivergence and ASD education in school curriculums.

Furthermore, some participants stated that they had some training but would like more 'as an extension to previous training/mentoring', and that they are 'always open to further training, skills and knowledge'. This implies that any previous training these participants received was insufficient, and that maybe the content of this training needs to be re-evaluated to ensure accurate knowledge on what ASD is, what language to use whilst discussing it, and what can be done to ameliorate the difficulties that autistic individuals experience.

Nevertheless, 25% negatively responded to the thought of training and did not want it, giving varying reasons why. Some were self-regarding in their responses, stating that they feel 'too old', they 'don't have time', and that they 'don't see it as a hugely pressing issue that those unaffected/disconnected from the disorder should learn about it'. One can see that a self-serving attitude towards educating oneself in neurodivergence correlates with putting the onus of the intervention back onto the person affected, correlating with the medical model of disability discussed in the literature review (144).

## 2.5.2 Examination of Training

It is evident that AAT is not only needed, but also wanted by many individuals. As discussed in the literature review, AAT aligns with the social model of disability; modifying autistic people's social environments to better accommodate their differences. AAT improves autism knowledge, decreases stigma, and produces more favourable assessments of autistic people by non-autistic people (64,113,178).

Nevertheless, there is debate over whether training extends to all form of biases (55,178), which is replicated through the questionnaire results. Despite many participants having good intentions, some evidently have implicit bias towards ASD. Many expressed acceptance of ASD, showing lack of explicit bias, yet showed apparent misconceptions and used stereotypical language, indicating unconscious, implicit bias, even if they previously had AAT. This coincides with Jones, et al.'s (2021a) (158) research, in that despite AAT reducing explicit biases to a greater extent than a general mental-health training module and a no-training control, non-autistic individuals may still have unconscious bias, manifesting in negative attitudes towards autistic people. Therefore, increased autism knowledge and familiarity from training may reduce explicit bias to a greater extent than implicit biases.

To counteract these implicit biases that persist despite AAT, this project proposes AAT should include autistic voices and lived experience, ensuring people are exposed to realistic representations of autism. A participant foregrounded this need, claiming they found stimming 'rare to witness', making them 'feel uncomfortable' as it is not something they 'have experience of first hand very often'. This response foregrounds how essential it is to have realistic representations of individuals with disabilities as they decrease damaging misconceptions (64,150,185,186). Studies such as McGill & Robinson's (2021) (150) have advocated for autistic people to be part of interventions. They concluded autistic adults should mobilise their lived experience in safeguarding and protecting autistic children during ABA intervention, as they know what is appropriate and how to protect autistic children from the traumatic experiences they went through (161). Similar to McGill & Robinson's example (150), this project proposes that autistic individuals should lead the intervention of AAT as this would encourage ASD familiarity for non-autistic people, as well as increasing ASD knowledge, ensuring both aspects of acceptance are incorporated into training. Furthermore, as indicated by this project's research findings, many people do not know how to react when they come face to face with autistic behaviour, and often ignore those individuals. Through including what is an appropriate response to autistic behaviour in training modules, it would decrease stigma and exclusion as non-autistic people would learn how to respond to autistic social cues and behaviour.

Moreover, the research findings indicate that this need for AAT is part of a wider need for neurodivergence awareness and acceptance. 63% of participants said they know what neurodivergence is in Q8, yet the questionnaire results demonstrate how very few people know the correct definitions. No participants successfully explained neurodivergence along the lines of individuals with selective neurocognitive functions or neurodevelopmental differences situated outside established norms, or that neurodivergence is not a neurodevelopmental disorder (Q9). In their attempt to explain it, many included correct features of neurodivergence yet only 46% provided an answer without any false information or misunderstandings. Some incorrectly believed neurodivergence meant that one had a psychological or neurodevelopmental condition, using phrases such as 'traits of autism, ADHD', 'slightly autistic', and 'atypical psychological disorders', yet as previously mentioned one does not need a specific condition to be neurodivergent. Many answers included colloquial language, with 63% mentioning the brain 'working differently', being 'wired differently' and being on 'different wavelengths'. These informal, simplified explanations indicate basic understanding of differing brain functioning yet are insufficient to understand the nuance of neurodivergence, as they do not mention the comparison to societal norms. Furthermore, some participants' language implied a narrative of blame, indicating implicit stigma and suggesting neurodivergence was a choice, stating neurodivergent individuals 'don't stick to the status quo'. This is accentuated by another participant explaining how neurodivergence 'relates to people who approach social/emotional/physical world differently to the accepted norm', with the term 'approach' suggesting neurodivergent people have agency in how to behave in relation to social norms, rather than being unable to attain or access them. Altogether, it is evident that not only ASD is misunderstood, but neurodivergence is as a whole.

## **Conclusion**

From this, one can see the paramount need for neurodivergence awareness and acceptance, with this project proposing neurodivergence acceptance training (NAT), including sections on ASD, to be made mandatory in school curriculums and workplace EDI initiatives. Training would align with the social model of disability, taking the onus solely off the autistic individual, and neurodivergent population more broadly, whilst giving some responsibility to neurotypical people. This would increase the inclusivity and comfort of autistic people's social environment. As mentioned in the literature review, communicative misunderstanding between autistic and allistic individuals is a bidirectional issue, so the intervention should involve both parties. The proposed training should incorporate general definitions, explanations on different presentations of neurodivergent behaviours and appropriate responses to it, and clarification of the symptomology of different neurodevelopmental disorders, such as ASD. The training should include real representations of neurodivergent individuals, including their voices, lived experiences and recommendations for further interventions.

# Bibliography

- 1 Allison, T., et al. Social perception from visual cues: role of the STS region. *Trends in Cognitive Sciences*. 2000; 4(7): 267–278.
- 2 American Psychiatric Association APA. Social perception [Internet]. 2023 [cited 22/04/23]. Available from: <https://dictionary.apa.org/social-perception>.
- 3 Hogg, M.A. & Vaughan, G.M. *Social psychology*. 7<sup>th</sup> edn. London: Pearson; 2014.
- 4 Legault, M., et al. From neurodiversity to neurodivergence: the role of epistemic and cognitive marginalization. *Synthese (Dordrecht)*. 2021; 199(5-6): 12843–12868.
- 5 Shah, P. J., et al. Neurodevelopmental disorders and neurodiversity: definition of terms from Scotland's National Autism Implementation Team. *The British Journal of Psychiatry*. 2022; 221(3): 577–579.
- 6 Bagatell, N. From Cure to Community: Transforming Notions of Autism. *Ethos (Berkeley, Calif.)*. 2010; 38(1): 33–55.
- 7 Kenny, L., et al. Which terms should be used to describe autism? Perspectives from the UK autism community. *Autism: the international journal of research and practice*. 2016; 20(4): 442–462.
- 8 Orsini, M., & Smith, M. Social movements, knowledge, and public policy: The case of autism activism in Canada and the US. *Critical Policy Studies*. 2010; 4(1), pp. 38–57.
- 9 Ortega, F. The cerebral subject and the challenge of neurodiversity. *BioSocieties*. 2009; 4: 425–445.
- 10 Botha, M., et al. Autism is me": an investigation of how autistic individuals make sense of autism and stigma. *Disability & society*. 2022; 37(3): 427–453.
- 11 Crompton, C. J., et al. 'I never realised everybody felt as happy as I do when I am around autistic people': a thematic analysis of autistic adults' relationships with autistic and neurotypical friends and family. *Autism*. 2020; 24: 1438–1448.
- 12 Kapp, S.K., et al. Deficit, Difference, or Both? Autism and Neurodiversity. *Developmental Psychology*. 2013; 49(1): 59-71.
- 13 Ne'eman, A. The Future (and the past) of autism advocacy, or why the ASA's magazine, *The Advocate*, wouldn't publish this piece. *Disability Studies Quarterly*. 2010; 30(1).
- 14 Guthrie, W., et al. Early diagnosis of autism spectrum disorder: Stability and change in clinical diagnosis and symptom presentation. *Journal of Child Psychology and Psychiatry*. 2013; 54(5): 582–590.
- 15 Bryson, S. E., et al. Autism spectrum disorders: early detection, intervention, education, and psychopharmacological management. *The Canadian Journal of Psychiatry*. 2003; 48(8): 506–516.

- 16 Zwaigenbaum, L., et al. Early intervention for children with autism spectrum disorder under 3 years of age: Recommendations for practice and research. *Pediatrics*. 2015; 136(1): 60–81.
- 17 Morris-Rosendahl, D. J., & Crocq, M. A. Neurodevelopmental disorders-the history and future of a diagnostic concept. *Dialogues in clinical neuroscience*. 2020; 22(1): 65–72.
- 18 Shah, P.J. & Morton, M.J.S. Adults with attention-deficit hyperactivity disorder – diagnosis or normality?. *British journal of psychiatry*. 2013; 203(5): 317–319.
- 19 Singer, J. What is neurodiversity. *Reflections on Neurodiversity*. 2020
- 20 Walker, N. Neurodiversity: Some basic terms & definitions [internet]. 2014 [cited 22/03/23]. Available from: <https://neuroqueer.com/neurodiversity-terms-and-definitions/>
- 21 American Psychiatric Association (APA). *Diagnostic and statistical manual of mental disorders: DSM-5, 5<sup>th</sup> edn*. Washington, D.C.: American Psychiatric Publishing; 2013.
- 22 Lai, M.-C., et al. Understanding autism in the light of sex/gender. *Molecular autism*. 2015; 6(1): 24.
- 23 Rodgers, M., et al. Interventions based on early intensive applied behaviour analysis for autistic children: a systematic review and cost-effectiveness analysis. *Health Technology Assessment*. 2020; 24(35): 1-306.
- 24 South, M., et al. Repetitive Behaviour Profiles in Asperger Syndrome and High-Functioning Autism. *Journal of Autism and Developmental Disorders*. 2005; 35(2): 145–158.
- 25 Baribeau, D.A. et al. Repetitive Behaviour Severity as an Early Indicator of Risk for Elevated Anxiety Symptoms in Autism Spectrum Disorder. *Journal of the American Academy of Child and Adolescent Psychiatry*. 2020; 59(7): 890–899.
- 26 Ghanizadeh, A. Clinical approach to motor stereotypies in autistic children. *Majallah-i bīmārīhā-yi kūdakān-i Īrān = Iranian journal of pediatrics*. 2010; 20(2): 149–159.
- 27 Nolan, J., & McBride, M. Embodied semiosis: Autistic ‘stimming’ as sensory praxis. In P. P. Trifonas (Ed.). *International handbook of semiotics*. Dordrecht, The Netherlands: Springer; 2015. 1069-1078.
- 28 Bottema-Beutel, K., et al. Avoiding Ableist Language: Suggestions for Autism Researchers. *Autism in Adulthood*. 2020; 3(1): 18–29.
- 29 Charlton, R.A. et al. ‘It feels like holding back something you need to say’: Autistic and Non-Autistic Adults accounts of sensory experiences and stimming. *Research in autism spectrum disorders*. 89: 101864.
- 30 Cunningham, A.B. & Schreibman, L. Stereotypy in autism: The importance of function. *Research in autism spectrum disorders*. 2008; 2(3): 469–479.

- 31 Kapp, S.K. et al. 'People should be allowed to do what they like': Autistic adults' views and experiences of stimming. *Autism: the international journal of research and practice*. 2019; 23(7): 1782–1792.
- 32 Khan, S. et al. Somatosensory cortex functional connectivity abnormalities in autism show opposite trends, depending on direction and spatial scale. *Brain (London, England: 1878)*. 2015; 138(5): 1394–1409.
- 33 Delacato, C. H. *The ultimate stranger: The autistic child*. Novato, CA: Arena Press; 1974.
- 34 Boyd, B. A., et al. Relationships among repetitive behaviours, sensory features, and executive functions in high functioning autism. *Research in Autism Spectrum Disorders*. 2009; 3(4): 959–966.
- 35 Haigh, S. M. Variable sensory perception in autism. *European Journal of Neuroscience*. 2018; 47(6): 602–609.
- 36 Kargas, N., et al. The Relationship Between Auditory Processing and Restricted, Repetitive Behaviours in Adults with Autism Spectrum Disorders. *Journal of Autism and Developmental Disorders*. 2015; 45(3): 658–668.
- 37 Lawson, R. P., et al. An aberrant precision account of autism. *Frontiers in Human Neuroscience*. 2014; 8: 302.
- 38 Pellicano, E. & Burr, D. When the world becomes “too real”: a Bayesian explanation of autistic perception. *Trends in Cognitive Sciences*. 2012; 16(10): 504-510.
- 39 Schulz, S.E. & Stevenson, R.A. Differentiating between sensory sensitivity and sensory reactivity in relation to restricted interests and repetitive behaviours. *Autism: the international journal of research and practice*. 2020; 24(1): 121–134.
- 40 Davidson, J. 'It cuts both ways': A relational approach to access and accommodation for autism. *Social Science & Medicine*. 2010; 70(2): 305–312.
- 41 Joyce C, et al. Anxiety, Intolerance of Uncertainty and Restricted and Repetitive Behaviour: Insights Directly from Young People with ASD. *Journal of Autism and Developmental Disorders*. 2017; 47(12): 3789-3802.
- 42 Leekam, S.R., et al. Restricted and Repetitive Behaviours in Autism Spectrum Disorders: A Review of Research in the Last Decade. *Psychological bulletin*. 2011; 137(4): 562–593.
- 43 Robertson, A. E., & Simmons, D. R. The Sensory Experiences of Adults with Autism Spectrum Disorder: A Qualitative Analysis. *Perception*. 2015; 44(5): 569–586
- 44 Smith, R.S. & Sharp, J. Fascination and Isolation: A Grounded Theory Exploration of Unusual Sensory Experiences in Adults with Asperger Syndrome. *Journal of autism and developmental disorders*. 2013; 43(4): 891–910.
- 45 Kim, S. Y., & Bottema-Beutel, K. Negotiation of Individual and Collective Identities in the Online Discourse of Autistic Adults. *Autism in Adulthood*. 2019; 1(1): 69–78.
- 46 Steward, R. L. Repetitive stereotyped behaviour or 'stimming': An online survey of 100 people on the autism spectrum. Paper Presented at the 2015 International

- Meeting for Autism Research. 2015 [cited 23/04/23]. Available from <https://insar.confex.com/insar/2015/webprogram/Paper20115.html>
- 47 Sasson, N., et al. Neurotypical Peers are Less Willing to Interact with Those with Autism based on Thin Slice Judgments. *Scientific Reports*. 2017; 7(1): 40700.
- 48 Ambady, N., & Rosenthal, R. Thin slices of expressive behaviour as predictors of interpersonal consequences: A meta- analysis. *Psychological Bulletin*. 1992; 111(2): 256–274.
- 49 Ambady, N., et al. Toward a histology of social behaviour: Judgmental accuracy from thin slices of the behavioural stream. *Advances in Experimental Social Psychology*. 2000; 32: 201–271.
- 50 Begeer, S. et al. Emotional competence in children with autism: Diagnostic criteria and empirical evidence. *Developmental review*. 2008; 28(3): 342–369.
- 51 Cage, E., et al. Understanding, attitudes and dehumanisation towards autistic people. *Autism*. 2019; 23: 1373–1383.
- 52 Human, L.J. et al. Accurate First Impressions Leave a Lasting Impression. *Social psychological & personality science*. 2013; 4(4): 395–402.
- 53 Matthews NL, et al. College students' perceptions of peers with autism spectrum disorder. *Journal of Autism and Developmental Disorders*. 2015; 45(1): 90-99.
- 54 Wood, T.J. et al. Can physician examiners overcome their first impression when examinee performance changes?. *Advances in health sciences education: theory and practice*. 2018; 23(4): 721–732.
- 55 Bast, D.F. et al. The Effect of Educational Messages on Implicit and Explicit Attitudes towards Individuals on the Autism Spectrum versus Normally Developing Individuals. *The Psychological record*. 2020; 70(1): 123–145.
- 56 Butler, R.C. & Gillis, J.M. The impact of labels and behaviours on the stigmatization of adults with Asperger's disorder. *Journal of autism and developmental disorders*. 2011; 1(6): 741-749.
- 57 Robertson, S. M. Neurodiversity, quality of life, and autistic adults: Shifting research and professional focuses onto real-life challenges. *Disability Studies Quarterly*. 2009; 30(1).
- 58 Robertson, S. M. & Ne'eman, A. D. Autistic acceptance, the college campus, and technology: Growth of neurodiversity in society and academia. *Disability Studies Quarterly*. 2008; 28(4).
- 59 Alkhalidi, R. S., et al. Do neurotypical people like or dislike autistic people? *Autism in Adulthood*. 2021; 3(3):275–279.
- 60 Morrison, K.E. et al. Variability in first impressions of autistic adults made by neurotypical raters is driven more by characteristics of the rater than by characteristics of autistic adults. *Autism: the international journal of research and practice*. 2019; 23(7): 1817–1829.



- 61 Morrison, K.E. et al. Outcomes of real-world social interaction for autistic adults paired with autistic compared to typically developing partners. *Autism: the international journal of research and practice*. 2020; 24(5): 1067–1080.
- 62 Brosnan, M. & Mills, E. The effect of diagnostic labels on the affective responses of college students towards peers with ‘Asperger’s Syndrome’ and ‘Autism Spectrum Disorder’. *Autism: the international journal of research and practice*. 2016; 20(4): 388–394.
- 63 DeBrabander K. M., et al. Do first impressions of autistic adults differ between autistic and nonautistic observers? *Autism in Adulthood*. 2019; 1(4): 250–257.
- 64 Gillespie-Lynch, K., et al. Changing college students’ conceptions of autism: An online training to increase knowledge and decrease stigma. *Journal of Autism and Developmental Disorders*. 2015; 45(8), pp. 2553–2566.
- 65 Gillespie-Lynch, K., et al. What Contributes to Stigma Towards Autistic University Students and Students with Other Diagnoses?. *Journal of Autism Developmental Disorders*. 2020; 51(2): 459–475.
- 66 Goffman, E. *Stigma: Notes on the management of spoiled identity*. New York: Simon & Schuster Inc; 1963.
- 67 Gray, A.J. Stigma in psychiatry. *Journal of the Royal Society of Medicine*. 2002a; 95(2): 72–76.
- 68 Kim, S.Y. & Gillespie-Lynch, K. Do Autistic People’s Support Needs and Non-Autistic People’s Support for the Neurodiversity Movement Contribute to Heightened Autism Stigma in South Korea vs. the US?. *Journal of autism and developmental disorders*. 2022; 1-15.
- 69 Link, B.G. & Phelan, J.C. Conceptualizing stigma. *Annual Review of Sociology*. 2001; 27: 363–385.
- 70 Link, B.G. & Phelan, J.C. Stigma and its public health implications. *The Lancet*. 2006; 367: 528–529.
- 71 Obeid, R. et al. A Cross-Cultural Comparison of Knowledge and Stigma Associated with Autism Spectrum Disorder Among College Students in Lebanon and the United States. *Journal of autism and developmental disorders*. 2015; 45(11): 3520–3536.
- 72 Bachmann, C.J. et al. Internalised stigma in adults with autism: A German multi-center survey. *Psychiatry research*. 2019; 276: 94–99.
- 73 Cappadocia, M. C., et al. Bullying experiences among children and youth with autism spectrum disorders. *Journal of Autism and Developmental Disorders*. 2012; 42(2):266–277.
- 74 Gray, D.E. Perceptions of stigma: the parents of autistic children. *Sociology of health & illness*. 1993; 15(1): 102–120.
- 75 Kinnear, S., et al. Understanding the experience of stigma for parents of children with autism spectrum disorder and the role stigma plays in families’ lives. *Journal of Autism and Developmental Disorders*. 2016; 46: 942–953.

- 76 Humphrey, N., & Lewis, S. 'Make me normal': The views and experiences of pupils on the autistic spectrum in mainstream secondary schools. *Autism: the international journal of research and practice*. 2008; 12(1): 23–46.
- 77 Shtayermman, O. An exploratory study of the stigma associated with a diagnosis of Asperger's syndrome: The mental health impact on the adolescents and young adults diagnosed with a disability with a social nature. *Journal of Human Behaviour in the Social Environment*. 2009; 19(3): 298–313.
- 78 Dehnavi, S. R., et al. The share of internalized stigma and autism quotient in predicting the mental health of mothers with autism children in Iran. *International Journal of Business and Social Science*. 2011; 2(20), pp. 251–259.
- 79 Gray, D. E. 'Everybody just freezes. Everybody is just embarrassed': Felt and enacted stigma among parents of children with high functioning autism. *Sociology of Health & Illness*. 2002b; 24(6): 734–749.
- 80 Alkhalidi, R. S., et al. Is there a link between autistic people being perceived unfavourably and having a mind that is difficult to read? *Journal of Autism and Developmental Disorders*. 2019; 49(10): 3973-3982.
- 81 Maich, K. *Autism Spectrum Disorders in Popular Media: Storied Reflections of Societal Views*. Brock education. 2014; 23(2): 97.
- 82 Draaisma, D. Stereotypes of autism. *Philosophical transactions of the Royal Society of London. Series B. Biological sciences*. 2009; 364(1522): 1475–1480.
- 83 Prochnow, A. An analysis of autism through media representation. *ETC: A Review of General Semantics*. 2014; 71(2): 133–149.
- 84 Thompson-Hodgetts, S. et al. Helpful or harmful? A scoping review of perceptions and outcomes of autism diagnostic disclosure to others. *Research in autism spectrum disorders*. 2020; 77: 101598.
- 85 Blascovich, J., et al. *Stigma, threat, and social interactions*. In T. F. Heatherton, R. E. Kleck, M. R. Hebl, & J. G. Hull (Eds.). *The Social Psychology of Stigma*. London: The Guilford Press; 2000. 301-333.
- 86 Bromgard, G., & Stephan, W. G. Responses to the stigmatized: Disjunctions in affect, cognitions, and behaviour. *Journal of Applied Social Psychology*. 2006; 36(10), pp. 2436–2448.
- 87 Cage, E. & Burton, H. Gender Differences in the First Impressions of Autistic Adults. *Autism Research*. 2019; 12(10): 1495-1504.
- 88 Berns, A. J. *Perceptions and experiences of friendship and loneliness in adolescent males with high cognitive ability and autism spectrum disorder* [Dissertation abstracts international: Section B: The sciences and engineering] [Internet]. 2017 [cited 17/02/23]. Available from: <https://ir.uiowa.edu/cgi/viewcontent.cgi?article=6393&context=etd>.
- 89 Eaves, L.C., & Ho, H.H. Young adult outcome of autism spectrum disorders. *Journal of Autism and Developmental Disorders*. 2008; 38(4): 739–747.

- 90 Howlin, P., et al. Autism and Developmental Receptive Language Disorder—a Follow-up Comparison in Early Adult Life. II: Social, Behavioural, and Psychiatric Outcomes. *Journal of child psychology and psychiatry*. 2000; 41(5): 561–578.
- 91 Howlin, P., et al. Adult outcome for children with autism. *Journal of Child Psychology and Psychiatry*. 2004; 45(2): 212–229.
- 92 Howlin, P. et al. Social Outcomes in Mid- to Later Adulthood Among Individuals Diagnosed With Autism and Average Nonverbal IQ as Children. *Journal of the American Academy of Child and Adolescent Psychiatry*. 2013; 52(6): 572–581.
- 93 Orsmond, G. I., et al. Peer relationships and social and recreational activities among adolescents and adults with autism. *Journal of Autism and Developmental Disorders*. 2004; 34(3): 245–256.
- 94 Orsmond, G. I., et al. Social participation among young adults with an autism spectrum disorder. *Journal of Autism and Developmental Disorders*. 2013; 43(11): 2710–2019.
- 95 Bauminger, N. & Kasari, C. Loneliness and Friendship in High-Functioning Children with Autism. *Child development*. 2000; 71(2): 447–456.
- 96 Campbell, J. M., & Barger, B. D. Peers' knowledge about and attitudes towards students with autism spectrum disorders. In V. B. Patel, V. R. Preedy, & C. R. Martin (Eds.). *Comprehensive Guide to Autism*. New York: Springer; 2014. 247–261.
- 97 Camus, L., et al. 'I too, need to belong': Autistic adults' perspectives on misunderstandings and well-being [Internet]. 2022 [cited 30/03/23]. Available from: <https://doi.org/10.31234/osf.io/5mysh>
- 98 Cassidy, S., & Rodgers, J. Understanding and preventing suicide in autism. *The Lancet Psychiatry*. 2017; 6: 11.
- 99 DaWalt, L. S., et al. Friendships and social participation as markers of quality of life of adolescents and adults with fragile X syndrome and autism. *Autism: the international journal of research and practice*. 2019; 23: 383–393.
- 100 Fleischer, A.S. Alienation and struggle: everyday student-life of three male students with Asperger syndrome. *Scandinavian Journal of Disability Research*. 2012; 14: 177–194.
- 101 Gelbar, N.W., et al. Systematic Review of Articles Describing Experience and Supports of Individuals with Autism Enrolled in College and University Programs. *Journal of autism and developmental disorders*. 2014; 44(10): 2593–2601.
- 102 Hedley, D., et al. Risk and protective factors underlying depression and suicidal ideation in autism spectrum disorder. *Depression and Anxiety*. 2018; 35: 648–657.
- 103 Kasari, C. et al. Social Networks and Friendships at School: Comparing Children with and Without ASD. *Journal of autism and developmental disorders*. 2011; 41(5): 533–544.

- 104 Link, B. G., et al. Stigma as a barrier to recovery: The consequences of stigma for the self-esteem of people with mental illness. *Psychiatric Services*. 2001; 52(12): 1621–1626
- 105 Mazurek, M. O. Loneliness, friendship, and well-being in adults with autism spectrum disorders. *Autism: the international journal of research and practice*. 2014; 18(3), 223–232.
- 106 Mitchell, P. Mindreading as a transactional process: Insights from autism. In V. Slaughter & M. de Rosnay (Eds.). *Environmental influences on ToM development*. Hove: Psychology Press; 2017.
- 107 Sumiya, M., et al. Emotions surrounding friendships of adolescents with autism spectrum disorder in Japan: A qualitative interview study. *PloS one*. 2018; 13(2): e0191538
- 108 Cage, E., et al. Experiences of Autism Acceptance and Mental Health in Autistic Adults. *Journal of Autism and Developmental Disorders*. 2018; 48(2), pp. 473-484.
- 109 Campbell, J.M. Middle school student's response to the self-introduction of a student with autism. *Remedial and Special Education*. 2007; 28(3): 163–173.
- 110 Dean, M., et al. The art of camouflage: Gender differences in the social behaviors of girls and boys with autism spectrum disorder. *Autism: the international journal of research and practice*. 2017; 21(6): 678–689.
- 111 Hull, L., et al. 'Putting on my best normal': Social camouflaging in adults with autism spectrum conditions. *Journal of Autism and Developmental Disorders*. 2017; 47(8): 2519–2534.
- 112 Lai, M.-C. et al. A behavioural comparison of male and female adults with high functioning autism spectrum conditions. *PloS one*. 2011; 6(6): e20835
- 113 Sasson, N.J. & Morrison, K.E. First impressions of adults with autism improve with diagnostic disclosure and increased autism knowledge of peers. *Autism: the international journal of research and practice*. 2019; 23(1): 50–59.
- 114 Bargiela, S., et al. The experiences of late- diagnosed women with autism spectrum conditions: An investigation of the female autism phenotype. *Journal of Autism and Developmental Disorders*. 2016; 46(10): 3281–3294.
- 115 Cage, E., & Troxell-Whitman, Z. Understanding the reasons, contexts, and costs of camouflaging for autistic adults. *Journal of Autism and Developmental Disorders*. 2019; 49(5): 1899–1911.
- 116 Gould, J. Towards understanding the under-recognition of girls and women on the autism spectrum. *Autism: the international journal of research and practice*. 2017; 21(6): 703–705.
- 117 Green, R. M., et al. Women and Autism Spectrum Disorder: Diagnosis and Implications for Treatment of Adolescents and Adults. *Current Psychiatry Reports*. 2019; 21(4), pp. 22.

- 118 Hull, L., & Mandy, W. Protective effect or missed diagnosis? Females with autism spectrum disorder. *Future Neurology*. 2017; 12(3): 159–169.
- 119 Lai, M.-C. et al. Quantifying and exploring camouflaging in men and women with autism. *Autism: the international journal of research and practice*. 2017; 21(6): 690–702.
- 120 Loomes, R., et al. What is the male-to-female ratio in autism spectrum disorder? A systematic review and meta-analysis. *Journal of the American Academy of Child & Adolescent Psychiatry*. 2017; 56(6), pp. 466–474.
- 121 Sedgewick, F., et al. Gender differences in the social motivation and friendship experiences of autistic and non- autistic adolescents. *Journal of autism and developmental disorders*. 2016; 46(4); 1297–1306.
- 122 Tierney, S., et al. Looking behind the mask: social coping strategies of girls on the autistic spectrum. *Research in Autism Spectrum Disorders*. 2016; 23: 73–83.
- 123 Boyd K, et al. Managing anxiety and depressive symptoms in adults with autism spectrum disorders. *Journal of Psychiatry & Neuroscience*. 2011; 36(4): E35–E36.
- 124 Cassidy, S. et al. Risk markers for suicidality in autistic adults. *Molecular autism*. 2018; 9(1): 42–42.
- 125 Hull, L. et al. Is social camouflaging associated with anxiety and depression in autistic adults?. *Molecular autism*. 2021; 12(1), pp. 1–13
- 126 Livingston, L. A., et al. Compensatory strategies below the behavioural surface in autism: A qualitative study. *The Lancet Psychiatry*. 2019; 6(9): 766–777.
- 127 Miller, D., et al. 'Masking Is Life': Experiences of Masking in Autistic and Nonautistic Adults. *Autism in Adulthood*. 2021; 3(4): 330-338.
- 128 Milton, D. On the ontological status of autism: the 'double empathy problem. *Disability & society*. 2012; 27(6): 883–887.
- 129 Milton, D. The double empathy problem [Internet]. 2018 [cited 01/12/22]. Available from: [https://kar.kent.ac.uk/66366/1/The%20double%20empathy%20problem%20\(PDF%20Ready\).pdf](https://kar.kent.ac.uk/66366/1/The%20double%20empathy%20problem%20(PDF%20Ready).pdf)
- 130 Baron-Cohen, S. Theory of mind and autism: A fifteen year review. In: S. Baron-Cohen, H. Tager-Flusberg, & D. J. Cohen (Eds.). *Understanding other minds: Perspectives from developmental cognitive neuroscience*. New York, NY: Oxford University Press; 2000. 2:3–20.
- 131 Edey, R., et al. Interaction takes two: Typical adults exhibit mind-blindness towards those with autism spectrum disorder. *Journal of Abnormal Psychology*. 2016; 125(7): 879–885.
- 132 Gernsbacher, M. A. Toward a behaviour of reciprocity. *The Journal of Developmental Processes*. 2006; 1: 138–152.

- 133 Heasman, B., & Gillespie, A. Perspective-taking is two- sided: Misunderstandings between people with Asperger’s syndrome and their family members. *Autism: the international journal of research and practice*. 2018; 22(6): 740–750.
- 134 Hutchison, T. The classification of disability. *Archives of Disease in Childhood*. 1995; 73(2): 91.
- 135 Jaswal, V. K., & Akhtar, N. Being vs. appearing socially uninterested: Challenging assumptions about social motivation in autism. *Behavioural and Brain Sciences*. 2018; 1: 1–84.
- 136 Mathersul, D., et al. Understanding advanced theory of mind and empathy in high-functioning adults with autism spectrum disorder. *Journal of Clinical and Experimental Neuropsychology*. 2013; 35(6): 655–668.
- 137 Milton, D. ‘Filling in the gaps’: A micro-sociological analysis of autism. *Autonomy, the Critical Journal of Interdisciplinary Autism Studies*. 2013; 1(2): 2051.
- 138 Milton, D. & Bracher, M. Autistics speak but are they heard. *Medical Sociology*. 2013; 7: 61–69.
- 139 Milton, D., et al. Double empathy. In F. R. Volkmar (Ed.). *Encyclopaedia of autism spectrum disorders*. London, England: Springer; 2018. 1-8.
- 140 Milton, D., et al. The ‘double empathy problem’: Ten years on. *Autism: the international journal of research and practice*. 2022; 26(8): 1901–1903.
- 141 Sasson, N.J., et al. The benefit of directly comparing autism and schizophrenia for revealing mechanisms of social cognitive impairment. *Journal of Neurodevelopmental Disorders*. 2011; 3(2): 87–100.
- 142 Sheppard, E., et al. How easy is it to read the minds of people with autism spectrum disorder?. *Journal of Autism and Developmental Disorders*. 2016; 46(4): 1247-1254.
- 143 Uljarevic, M., & Hamilton, A. Recognition of emotions in autism: a formal meta-analysis. *Journal of Autism and Developmental Disorders*. 2013; 43(7): 1517–1526.
- 144 Jaarsma, P., & Welin, S. Autism as a natural human variation: Reflections on the claims of the neurodiversity movement. *Health Care Analysis*. 2012; 20(1): 20–30.
- 145 Armstrong, T. *Neurodiversity: Discovering the extraordinary gifts of autism, ADHD, dyslexia, and other brain differences*. Cambridge, MA: Da Capo; 2010.
- 146 Baker, D. L. *The politics of neurodiversity: Why public policy matters*. Boulder, CO: Lynne Rienner; 2011.
- 147 Constantino C.D. What can stutterers learn from the neurodiversity movement? *Seminars in Speech and Language*. 2018; 39(4): 382–396.
- 148 Dwyer, P. The Neurodiversity Approach(es): What Are They and What Do They Mean for Researchers?. *Human Development*. 2022; 66(2): 73-92.
- 149 Hehir, T. Eliminating ableism in education. *Harvard Educational Review*. 2002; 72(1), pp. 1-33.

- 150 McGill, O. & Robinson, A. 'Recalling hidden harms': autistic experiences of childhood applied behavioural analysis (ABA). *ADVANCES IN AUTISM*. 2021; 7(4): 269–282.
- 151 Oliver, M. The ideological construction of disability. In *The politics of disablement*. London: Macmillan Education; 1990. 43–59.
- 152 Rauscher, L. & McClintock, J. Ableism curriculum design. In Adams, M., Bell, L.A. and Griffen, P. (Eds). *Teaching for Diversity and Social Justice*. Routledge, New York, NY; 1996. 198-231.
- 153 Legault, M., et al. Neurocognitive variety in neurotypical environments: The source of “deficit” in autism. *Journal of Behavioural and Brain Science*. 2019; 9, 246–272.
- 154 Oliver, M. The disability movement and the professions. *British Journal of Therapy and Rehabilitation*. 1999; 6(8): 377–379.
- 155 Shakespeare, T. The social model of disability. *The Disability Studies Reader*. 2006; 2: 197–204.
- 156 Tobin MC, et al. A systematic review of social participation for adults with autism spectrum disorders: support, social functioning, and quality of life. *Research in Autism Spectrum Disorders*. 2004; 8(3): 214–229.
- 157 DeJong, G. Independent living: From social movement to analytic paradigm. *Archives of Physical Medicine and Rehabilitation*. 1979; 60(10): 435–446.
- 158 Jones, D.R., et al. Effects of autism acceptance training on explicit and implicit biases toward autism. *Autism: the international journal of research and practice*. 2021a; 25(5): 1246–1261.
- 159 Jones, D.R. et al. Greater Social Interest Between Autistic and Non-autistic Conversation Partners Following Autism Acceptance Training for Non-autistic People. *Frontiers in psychology*. 2021b: 12: 739147–739147.
- 160 Kirkham, P. 'The line between intervention and abuse' – autism and applied behaviour analysis. *History of the human sciences*. 2017; 30(2): 107–126.
- 161 Milton, D. Autistic expertise: A critical reflection on the production of knowledge in autism studies. *Autism: the international journal of research and practice*. 2014; 18(7): 794–802.
- 162 Lovaas, O. I. Behavioural treatment and normal educational and intellectual functioning in young autistic children. *Journal of Consulting and Clinical Psychology*. 1987; 55: 3-9.
- 163 Mohammadzaheri, F. et al. A Randomized Clinical Trial Comparison Between Pivotal Response Treatment (PRT) and Structured Applied Behavior Analysis (ABA) Intervention for Children with Autism. *Journal of autism and developmental disorders*. 2014; 44(11): 2769–2777.
- 164 Bascom, J. Just stimming: the obsessive joy of autism [Internet]. 2011 [cited 24/02/23]. Available from: <https://juststimming.wordpress.com/2011/04/05/the-obsessive-joy-of-autism/>

- 165 Grove, R., et al. Special interests and subjective wellbeing in autistic adults. *Autism Research*. 2018; 11(5): 766–775.
- 166 Milton, D., & Sims, T. How is a sense of well-being and belonging constructed in the accounts of autistic adults?. *Disability & Society*. 2016; 31(4): 520–534.
- 167 Bottema-Beutel, K., et al. Commentary on Social Skills Training Curricula for Individuals with ASD: Social Interaction, Authenticity, and Stigma. *Journal of autism and developmental disorders*. 2018; 48(3): 953–964.
- 168 Pearson, A., & Rose, K. A conceptual analysis of autistic masking: understanding the narrative of stigma and the illusion of choice. *Autism Adult*. 2021; 3: 52–60.
- 169 Cassidy, S.A. et al. Is Camouflaging Autistic Traits Associated with Suicidal Thoughts and Behaviours? Expanding the Interpersonal Psychological Theory of Suicide in an Undergraduate Student Sample. *Journal of autism and developmental disorders*. 2020; 50(10): 3638–3648.
- 170 Kupferstein, H. Evidence of increased PTSD symptoms in autistics exposed to applied behaviour analysis. *Advances in Autism*. 2018; 4(1): 19-29.
- 171 Lanovaz, M.J. et al. Effects of reducing stereotypy on other behaviours: A systematic review. *Research in autism spectrum disorders*. 2013; 7(10): 1234–1243.
- 172 Lilley, R. What's in a flap? The curious history of autism and hand stereotypies. Manuscript submitted for publication; 2018.
- 173 Bascom, J. *Loud hands: Autistic people, speaking*. Washington, DC: Autistic Press; 2012.
- 174 Pellicano, E. Editorial. *Autism*. 2013; 17; 131–132.
- 175 Corrigan, P.W. & Nieweglowski, K. How does familiarity impact the stigma of mental illness? *Clinical psychology review*. 2019; 70: 40–50.
- 176 Gardiner, E. & Iarocci, G. Students with Autism Spectrum Disorder in the University Context: Peer Acceptance Predicts Intention to Volunteer. *Journal of autism and developmental disorders*. 2014; 44(5): 1008–1017.
- 177 Baron-Cohen, S. Editorial Perspective: Neurodiversity – a revolutionary concept for autism and psychiatry. *Journal of child psychology and psychiatry*. 2017; 58(6): 744–747.
- 178 Dickter, C. L., et al. Assessment of Sesame Street online autism resources: impacts on parental implicit and explicit attitudes toward children with autism. *Autism: the international journal of research and practice*. 2020a; 25: 114–124.
- 179 Ling, C. Y., et al. Attribution model of stigma towards children with autism in Hong Kong. *Journal of Applied Research in Intellectual Disabilities*. 2010; 23(3): 237–249.
- 180 Mahoney, D. College students' attitudes toward individuals with autism. *Dissertation Abstracts International*. 2008; 68(11-B): 7672.



- 181 Haslam, S. A., et al. Taking the strain: Social identity, social support, and the experience of stress. *British Journal of Social Psychology*. 2005; 44(3): 355–370.
- 182 Hurlbutt, K., & Chalmers, L. Adults with autism speak out: Perceptions of their life experiences. *Focus on Autism and Other Developmental Disabilities*. 2002; 17(2): 103–111.
- 183 Weiss, J.A. et al. The impact of child problem behaviours of children with ASD on parent mental health: The mediating role of acceptance and empowerment. *Autism: the international journal of research and practice*. 2012; 16(3), pp. 261–274.
- 184 Kapp, S.K. et al. How is autistic identity in adolescence influenced by parental disclosure decisions and perceptions of autism?. *Autism: the international journal of research and practice*. 2021; 25(2): 374–388.
- 185 Moore, D. & Nettelbeck, T. Effects of short-term disability awareness training on attitudes of adolescent schoolboys toward persons with a disability. *Journal of intellectual & developmental disability*. 2013; 38(3): 223–231.
- 186 Schwartz, D. et al. Dispelling stereotypes: promoting disability equality through film. *Disability & society*. 2010; 25(7): 841–848.
- 187 Demetriou, et al. Self Report questionnaires [Internet]. 2015 [17/04/23]. Available from: <https://bilgeuzun.com/wp-content/uploads/2017/10/Self-Report-wbecp507.pdf>
- 188 Nevill, R. E., & White, S. W. College students' openness toward autism spectrum disorders: improving peer acceptance. *Journal of Autism & Other Developmental Disorders*. 2011; 41(12): 1619–1628
- 189 Althubaiti, A. Information bias in health research: definition, pitfalls, and adjustment methods. *Journal of multidisciplinary healthcare*. 2016; 9(1):211–217.
- 190 Punnoose, A.R. Importance of Anonymity to Encourage Honest Reporting in Mental Health Screening After Combat Deployment. *JAMA: the journal of the American Medical Association*. 2011; 306(23): 2546.
- 191 Dovidio, J. F., et al. On the nature of prejudice: Automatic and controlled processes. *Journal of Experimental Social Psychology*. 1997; 33: 510–540.
- 192 Hinshaw SP. & Stier A. Stigma as related to mental disorders. *Annual Review of Clinical Psychology*. 2008; 4: 367-393.
- 193 Obeid, R. et al. Do Implicit and Explicit Racial Biases Influence Autism Identification and Stigma? An Implicit Association Test Study. *Journal of autism and developmental*. 2021; 51(1): 106–128.
- 194 Dickter, C. L., et al. Implicit and Explicit Attitudes Toward Autistic Adults. *Autism in Adulthood*. 2020b; 2: 144–151.
- 195 Rydell, R. J., & McConnell, A. R. Understanding implicit and explicit attitude change: A systems of reasoning analysis. *Journal of Personality & Social Psychology*. 2006; 91(6): 995–1008.

- 196 Stier, A., & Hinshaw, S. P. Explicit and implicit stigma against individuals with mental illness. *Australian Psychologist*. 2007; 42: 106–117.
- 197 Strack, F., & Deutsch, R. Reflective and impulsive determinants of social behaviour. *Personality and Social Psychology Review*. 2004; 8: 220–247.
- 198 McMahon, C.M., et al. Perceived versus actual autism knowledge in the general population. *Research in autism spectrum disorders*. 2020; 71: 101499.
- 199 Shawahna, R., et al. Awareness and knowledge of autism spectrum disorders among pharmacists: A cross-sectional study in Palestinian pharmacy practice. *Journal of Autism and Developmental Disorders*. 2017; 47(6): 1618–1627.
- 200 Stern, S.C. & Barnes, J.L. Brief Report: Does Watching The Good Doctor Affect Knowledge of and Attitudes Toward Autism?. *Journal of Autism and Developmental Disorders*. 2019; 49(6): 2581–2588.
- 201 Dillenburger, K., et al. Awareness and knowledge of autism and autism interventions: a general population survey. *Research in Autism Spectrum Disorders*. 2013; 7(12): 1558–1567.
- 202 Dillenburger, K., et al. Creating an inclusive society... How close are we in relation to autism spectrum disorder? A general population survey. *Journal of Applied Research in Intellectual Disabilities*. 2015; 28(4): 330–340.
- 203 Brewer, R. et al. Can Neurotypical Individuals Read Autistic Facial Expressions? Atypical Production of Emotional Facial Expressions in Autism Spectrum Disorders. *Autism research*. 2016; 9(2): 262–271.

## Appendix I : Qualitative answers

Q9. If yes, how would describe it – neurodivergence.

ID	Name	Responses
1	anonymous	Someone who's brain works in a different manor to that of a "normal" person. This can be through thought processes or how they perceive the world around them.
2	anonymous	A hypo or hyper functioning mental process that usually leads to a behavioural trait can lead to difficulties in everyday life. Especially when held to neurotypical standards of behaviour.
3	anonymous	An ability to see things in a different way and not be able to control this, sometimes effecting behaviour and emotions
4	anonymous	There are some differences in thinking and behaviour.
5	anonymous	It is when the brain works differently from a typical brain. People with ADHD, Autism etc. may be described as neurodiverse. It can mean that learning, communication and daily tasks can be more challenging.
6	anonymous	Someone who just sees things in a different way or brain connections not as "the norm" so affects their outlook on life and how they function.
7	anonymous	That you may not perceive or interpret the world in the same way as the majority of the population.
8	anonymous	brain function that may not be neurotypical.
9	anonymous	Differences in the brain chemistry or make up making behaviour, communication and various needs different to the "average" person.
10	anonymous	People whose brains develop or work differently from the accepted 'norm'.
11	anonymous	The brain and senses may process/act differently to how we would expect from someone 'typical'
12	anonymous	Having ways of thinking and processing information that are different than that of the average or "neurotypical" person. This could be sensory information or interpersonal cues as examples.
13	anonymous	Behaviour not conforming to the norm, brain works different to neurotypical people
14	anonymous	the way in which someone's brain works, and it not being the typical way that most peoples brains do work

ID	Name	Responses
15	anonymous	People whose brains are wired differently to the neurological brain which includes dyslexia (particular interest to me as my son is dyslexic)
16	anonymous	Someone whose brain does not function in the way that society considers normal and this can affect how they interact with the world around them
17	anonymous	It often refers to people with certain difficulties such as autism
18	anonymous	Brain development different to neurotypical brain development.
19	anonymous	Relates to people who approach social/emotional/physical world differently to the accepted norm
20	anonymous	Differences in how the brain is "wired" which in turn affect how the brain works and outwardly the behaviours expressed by an individual.
21	anonymous	Different brain activity/responses to what is considered normal. Such as autism/dyslexia/adhd.
22	anonymous	I've now looked it up
23	anonymous	It describes the range of brain activity and is often used to describe people outside the usual range. Often used when talking about people with learning disabilities but actually could be any one or more of a range of causes from medical, trauma etc.
24	anonymous	People who's brain works in a different way to large percentage of people
25	anonymous	There brain function differs to the typical/average person, impacting the way they think, perceive and do things
26	anonymous	Differing ways that humans brains work when it comes to learning and social situation.
27	anonymous	Not what is known as normal
28	anonymous	non-typical brain in some way, causing you to act/think differently to the average person e.g. autism, ADHD
29	anonymous	Neurodivergence is brain function that is considered atypical or outside or the norm
30	anonymous	people who are neurodivergent may process the world differently to others (neurotypicals), consequently reacting differently in various situations but also having the potential to struggle processing these things due to a specific combination of factors whether that be in the environment such as noise

ID	Name	Responses
31	anonymous	Traits of Autism. ADHD.
32	anonymous	someone whose brain processes information in a way that is not typical or considered Normal.
33	anonymous	An interpretation of the world/environment /external experience, how that situation is read and understood and related /reacted to, which is different from what would be considered average or 'norm'
34	anonymous	The diversity in individuals brains and cognition
35	anonymous	Variations in how we all think and act cognitively
36	anonymous	Hardwork
37	anonymous	When someone's brain sees the world differently to others
38	anonymous	Your brain is wired differently to what is regarded normal by society.
39	anonymous	So done whose brain functions differently to the norm
40	anonymous	Brain that acts different from the norm
41	anonymous	Someone whose brain develops differently
42	anonymous	Differences in how the brain functions, causing conditions such as ASD
43	anonymous	When a person's brain works (processes) things differently to the normal (typical)
44	anonymous	People with a diagnosis of Autism, ADHD or Aspergers are neuro diverse. They see and react to the world differently depending on the individual and how they perceive the world. Everone is different.
45	anonymous	Just thinking / operating in a different way from the perceived "normal".
46	anonymous	Someone that is not neurotypical, exhibiting behaviour and skills that are different to the typical norm.
47	anonymous	Asd
48	anonymous	Individuals brains working differently to others

ID	Name	Responses
49	anonymous	Some people have brains that work differently, like they are wired differently so are better or worse at different things.
50	anonymous	persons who's brains receive/process/express things that are not considered 'normal/typical'
51	anonymous	The functions of the brain and cognitions differ from those considered the 'average' or 'norm'. Their differences can be expressed through behaviour, mindset or perception.
52	anonymous	Differences in cognition and thinking processes
53	anonymous	Human brain working differently
54	anonymous	When someone's brain works/processes differently to that of the neurotypical population
55	anonymous	Having a brain that works in a different way to what is considered normal
56	anonymous	Someone who's brain is wired differently
57	anonymous	Differences in the brain that cause differences in behaviour and decision in comparison to individuals considered neurotypical
58	anonymous	One's brain has differences to others which affects how it works
59	anonymous	It's where the brain works in a slightly different way. The individual perceives the world in a slightly different way.
60	anonymous	The Brain of a neurodivergent person processes differently to a non neurodivergent brain - causing behaviour learning and medical issues and challenges for that individual coupled with sensory processing challenges
61	anonymous	When someone's brain functions/learns/processes differently to what is considered typical.
62	anonymous	Someone who thinks and feels in a way that may be considered atypical according to societal norms
63	anonymous	Someone who may have a learning disability, mental disorder or other condition which affects their ability to interpret/process information.
64	anonymous	when peoples brain process think and learn in a different way to 'typical' people.
65	anonymous	Someone who's brain doesn't function to what is usually classed as "normal"

ID	Name	Responses
66	anonymous	-WE ALL THINK DIFFERENTLY -OUR BRAINS ARE ON DIFFERENT WAVELENGTHS
67	anonymous	The brain works differently to others
68	anonymous	Someone who's brain function or behaviour patterns vary from what is considered the normal or average. For varying reasons.
69	anonymous	Slightly autistic/ not quite able to understand or fit in easily to what's going on around them in society
70	anonymous	Having a difference in the way you learn, process information, or have medical or behaviour differences.
71	anonymous	Someone who's behaviour is considered different from what society calls normal
72	anonymous	They have differences in their brain
73	anonymous	Brain function is different from the norm - for example adhd autism etc
74	anonymous	Differences in the way that we act and react to various stimuli
75	anonymous	Your brain affects how you operate compared to others, medical/ learning disabilities/disorders etc....
76	anonymous	Brain development and differences
77	anonymous	Someone who understands and behaves differently to the norm, due to differences in the brain.
78	anonymous	Atypical way of perceiving the surrounding world.
79	anonymous	How someone's brain works differently
80	anonymous	When something beyond your control affects how you think or how you brain reacts.
81	anonymous	The brain does not process information, in the normal way.
82	anonymous	Atypical psychological disorders
83	anonymous	They don't stick to the status quo. The way they perceive the world is different than "normal".
84	anonymous	it's when your brain works slightly differently

ID	Name	Responses
85	anonymous	When your brain works differently to the 'typical' brain
86	anonymous	Your brain working differently than neurotypical people's
87	anonymous	When someone's brain works differently to 'normal people' such as dyslexia or adhd or depression.
88	anonymous	Having additional needs which impact your day-to-day life, which aren't automatically catered for within society.

15.If yes, how would you explain it? – ASD

ID	Name	Responses
1	anonymous	Although I work with a lot of people with Autism I find it difficult to explain.
2	anonymous	I know what it is just not sure how to describe it
3	anonymous	A series group of neurodivergent traits that make make it difficult for an individual to navigate social situations.
4	anonymous	Different wiring 😊
5	anonymous	Brains are wired/work differently.
6	anonymous	It involves difficulties in communication, often through a literal understanding of ideas. Difficulties with social communication, not knowing what to say, how to begin a conversation and maintain it. Some people with Autism can lack empathy and imagination. Often people with Autism have special interests. Processing difficulties.
7	anonymous	Many facets to someone having autism and many behaviours as the name suggests there is a spectrum. Specific and single minded view on things.
8	anonymous	It may mean that an individual finds difficulty in social communication and not be able to interpret body language, may not be able to empathise or have an understanding of the feelings of others.
9	anonymous	Challenges in learning or development. Challenges with social interaction
10	anonymous	People like things in order. Can't deal with unexpected things. Like routine.



ID	Name	Responses
11	anonymous	Autism is a range developmental issues caused by differences in tje brain. This includes lack of social awareness, rigidity of thought and sensory issues.
12	anonymous	Children and adults with ASD may share certain traits such as avoiding eye contact, difficulty interpreting emotions and facial expressions and a hyper focus in their interests. Some may be avoidant of certain textures and flavours. ASD can vary in severity.
13	anonymous	Having differences in the way you process information about the world around you, and having differences in the way you cope with processing this information. Experiencing burnout and meltdowns as a result of the effort used to cope with processing all the information in the environment.
14	anonymous	Brain works different to others
15	anonymous	There are various conditions the relate to autism spectrum disorder, most commonly learning disabilities or behavioural challenges.
16	anonymous	Developmental differences caused by differences in thd brain
17	anonymous	ASD is a condition affecting your social development. It can also have an impact on speach, mobility and cognitive skills.
18	anonymous	Certain behaviours of differing intensity depending on where on the spectrum the individual is. People with autism often struggle with unexpected change and busy environments
19	anonymous	Someone who relates to the world in a different way to what society determines to be normal Often highly intelligent, but not always a follower of societal norms.
20	anonymous	Where certain things can become overwhelming and you think slightly different to those without
21	anonymous	Disorder that affects how people communicate, behave, process etc.
22	anonymous	A developmental disability which can present in a variety of ways often affecting an individual's ability to communicate, be "social", learn, experience and or appropriately filter the environment around them.
23	anonymous	Someone who perceives reality differently than others, that acts in a way that is not normal whom might have difficulties learning in certain fields of work
24	anonymous	It's when someone has difficulty expressing how they feel & feel awkward around people, new surroundings. Some don't like lots of noise or physical contact
25	anonymous	A developmental disability?

ID	Name	Responses
26	anonymous	A disorder with a large spectrum of differences from social development or lack off all the way to complex learning difficulties and sensory processing disorder
27	anonymous	Huge spectrum of disability from people with Asperger's syndrome who may (or may not) have high intellect to those people whose disability makes it impossible to function without a lot if assistance. Autistic people usually have great problem with communication and can also be quite obsessive about their interests and find it difficult go concentrate about other things. Often see things very much as 'black and white'.
28	anonymous	It is where the brain is wired differently
29	anonymous	Someone that struggles with learning, or can be behaviour issues.
30	anonymous	Have trouble mixing and processing feelings
31	anonymous	From my understanding it's a scale, of traits/characteristics/behaviours that when considered collectively will tilt towards one side or the other in terms of ADS diagnosis or not.
32	anonymous	Behavioural issues
33	anonymous	A different understanding of people
34	anonymous	often described as a sc
35	anonymous	It's a developmental disorder that affects social interaction, interests as well as certain behaviours.
36	anonymous	I would explain Autism as seeing the world differently, not having emotional attachment
37	anonymous	My Great Nephew has ASD. His Brain works differently.
38	anonymous	Developmental disorders caused by differences in the brain.
39	anonymous	The neurological and developmental disorder Can effect communication , perception , understanding ,
40	anonymous	A condition in which someone can be sensitive to their environment and and the people around them and have difficulty in expressing and processing and interacting with it /people
41	anonymous	Off key
42	anonymous	Those with social and communicational needs.

ID	Name	Responses
43	anonymous	Issues around communication, building relationships, focusing
44	anonymous	I think there is a spectrum of autistic tendencies that every person sits within, varying from functioning as per the norm through to those that see or decipher life differently
45	anonymous	Trouble with communication and interaction in a social environment
46	anonymous	Disability caused by a difference in the brain
47	anonymous	Differences in how the brain handles things causing challenges with interacting
48	anonymous	I understand it but can't explain it
49	anonymous	Could be an array of different issues, usually unable to cope in social environments, interaction with other, the ability to read body language
50	anonymous	As in question 9
51	anonymous	ASD is a spectrum of various patterns of cognitive thinking/organisation/communication. Each person is individual .
52	anonymous	Varied and I don't understand it well, but often displaying different social development (in childhood), generally enjoying structure and routine, enjoying lining up toys, struggling in new or social situations or transitions, delayed speech, some obsessive behaviour and some physical behaviour eg flapping with excitement. Lots of skills too which are advanced for their age, although different it shouldn't be seen as "less".
53	anonymous	Spectrum of sen
54	anonymous	Huge spectrum. Severe to minor. Cannot communicate. Poor concentration. Unable to cope with everyday situations, crowds, shopping, etc. No idea of time or what acceptable behaviour.
55	anonymous	You are somewhere on the autistic spectrum?
56	anonymous	the expression of people who relate in different/complex/what would be considered unusual ways to the world around them, often showing enhanced sensitivities or abilities in certain areas. Considered developmental disabilities but I do not agree with this statement.
57	anonymous	Autism is a developmental disorder that is part of a wide spectrum of different learning disabilities. It may cause individuals to have issues understand social queues or emotional intelligence.
58	anonymous	A neurological disorder which affects cognitive development

ID	Name	Responses
59	anonymous	A vast spectrum of human superheroes living in our ignorant world.
60	anonymous	Part of neurodivergence. When an individual struggles with social and communication skills and also has obsessions/ritualistic behaviours
61	anonymous	Autism or a related disability
62	anonymous	Autism can affect the way someone thinks and behaves. It is due to differences in the brain. It comes under the neuro diverse umbrella.
63	anonymous	Your brain is wired slightly differently and you have strengths in certain areas but struggle in other areas- usually social skills
64	anonymous	It's a developmental disability caused by differences in the brain
65	anonymous	It's an example of neurodivergence. An individual may have difficulties socialising, reading social clues etc. They may have a particular strength eg maths, creativity.
66	anonymous	Autism is related to social communication and interaction issues/ restrictions, lack of emotions, facial expressions, learning difficulties, in some cases mute, causing an inability to speak at all, repeated patterns of behaviour, fixations, anxiety and fear of change of routines, physically unable to move around the same as others. Cannot cope with loud noises - Associated conditions such as Asperger's
67	anonymous	Not able to process emotions
68	anonymous	Developmental disability/differences in the brain
69	anonymous	Someone who suffers from any level of autism, which can affect their ability to process emotions, recognise emotions in others, process environmental stimulus etc
70	anonymous	Autism is a spectrum disorder where an individual struggles to process and interpret social situations and interactions. This may affect individuals to different degrees.
71	anonymous	a developmental disorder that affects how individuals respond to their environment
72	anonymous	SOMEONE IS AUTISTIC AND IS MEASURED TO DIFFERENT LEVELS ON SCALE FROM LOW TO HIGH OF STRUGGLING WITH VARIOUS THINGS IN LIFE
73	anonymous	The behavioural patterns of Autism existing on a scale of mildly affected to severely affected being considered a spectrum onto which someone's behaviour level of autistic tendencies can be classified.
74	anonymous	As above answer

ID	Name	Responses
75	anonymous	Social, understanding of social situations difficulties and accompanying behavioural and emotional responses to that.
76	anonymous	Someone who struggles to interact with other people/environments according to the social norms of society
77	anonymous	Neurodevelopmental conditions, difficulties in communication and interaction with people
78	anonymous	An individual who may have social interaction problems - ocd - noise sensitivity - has trouble communicating either verbally or physically and may not understand the comms of others
79	anonymous	A diagnosis of the way in which people react to certain inputs
80	anonymous	I used to work in an autism unit so I'm fully aware of asd, you can't always put asd people in a neat little box- there are many variations as we are individuals- I prefer not to have preconceived ideas and stereotype people in the autism spectrum.
81	anonymous	Brain differences that can impact various aspects of your life ability to communicate/sensory issues etc
82	anonymous	Anxious/ worried
83	anonymous	A person who is on the asd spectrum has various difficulties, differing in severity and type. Typically struggling with social and communication and consequently behavioural difficulties.
84	anonymous	People see the world differently to others
85	anonymous	A cognitive condition which can manifest in behavioural, sensory and/or social differences.
86	anonymous	A disability caused by the functions of the brain
87	anonymous	Different perspective from things
88	anonymous	hmm your brain is a bit different and causes you to need certain things or think in a certain way
89	anonymous	A neurodevelopmental disorder that affects brain functioning
90	anonymous	Your brain working differently than neurotypical people

ID	Name	Responses
91	anonymous	I think it's autism, looking into how there is a spectrum that everyone sits on. It is a neurological disorder which means people are hypersensitive to things such as changes in their schedule or loud noises, struggle with reading emotions etc
92	anonymous	A disability which influences social skills, such as communication, and mental health. It can include symptoms like not being able to make eye contact, not understanding social cues and having fixed obsessions.
93	anonymous	Being on the autistic spectrum - lack of theory of mind, difficulty empathising, difficulty socialising "normally", sometimes can be a savant

**19** If yes, how would you explain it? – ASD

ID	Name	Responses
1	anonymous	Differences in the brain often effecting social interactions, communication and behaviours. It is a very broad spectrum, some people will need help with every day situations others will manage or mask.
2	anonymous	It involves difficulties in communication, often through a literal understanding of ideas. Difficulties with social communication, not knowing what to say, how to begin a conversation and maintain it. Some people with Autism can lack empathy and imagination. Often people with Autism have special interests. Processing difficulties.
3	anonymous	You think you know as you hear people saying the word autistic or autism quite frequently.
4	anonymous	As above
5	anonymous	I can normally define it but my brain isn't working today.
6	anonymous	As question 15
7	anonymous	Children and adults with ASD may share certain traits such as avoiding eye contact, difficulty interpreting emotions and facial expressions and a hyper focus in their interests. Some may be avoidant of certain textures and flavours. ASD can vary in severity.
8	anonymous	Brain works different to neurotypical individuals Unable to rationalise behaviour Selfish behaviour Very rarely in the wrong Poor social and communication skills Anxiety disorder Can be highly intelligent and observant Lack good friendships Isolate themselves

ID	Name	Responses
9	anonymous	A disorder that affects how people communicate, behave, process etc.
10	anonymous	As above (question 15)
11	anonymous	I have 2 good friends with autistic children both very different levels of autism and feel I could explain it but not fully
12	anonymous	As aboveas above
13	anonymous	A person who has autism usually has difficulty in communication or interactions with other people and often finds new tasks or routines very stressful
14	anonymous	It isn't always positive but it's something that with the right accommodations it's by very negative and it effects everyone differently it's just not understanding social norms
15	anonymous	It's a developmental disorder that affects social interaction, interests as well as certain behaviours.
16	anonymous	Differences in how the brain handles things causing challenges with interacting
17	anonymous	People with ASD see and react to the world differently. They can have a learning disability. They can react to over stimulation in certain situations eg: noises, be vocal or not. Quite often routine is important. Have obsessions. Everyone is different.
18	anonymous	As stated above.
19	anonymous	Tried above
20	anonymous	High functioning with daily living issues to non verbal, extreme behavior, no self care.
21	anonymous	see above!
22	anonymous	Autism Spectrum Disorder is a neurological and developmental disorder associated with learning difficulties and cognitive disorders.
23	anonymous	Human brains work differently, many variants.
24	anonymous	An organic disorder that affects an individuals ability to communicate and socialise alongside engaging in obsessions and rituals
25	anonymous	I have already answered this, not sure it is was a great answer though!
26	anonymous	Neuropsychological disorder that results in differences in language, communication and behaviours

ID	Name	Responses
27	anonymous	People who have ASD suffer with problems that can affect their social behaviour, communication and interaction with others. They have a certain way of doing things and it has a repetitive form they follow every time. They are socially in apt finding it difficult to mix, play, talk with others, can't hold eye contact. Get themselves in 'a spin' when they can't cope.
28	anonymous	As above.
29	anonymous	I believe I have explained this as above
30	anonymous	Unable to process others emotions and having a lack of empathy. They don't have the mirror neurons to be able to put them self in another point of view
31	anonymous	children with ASD often have different responses to sensory stimuli such as a strong response or a slow/lack of response or sensory seeking response.
32	anonymous	-SOMEONE CAN FIND EVERY DAY ACTIVITIES DIFFICULT TO APPROACH -A NEED FOR ROUTINE WITH TIMES AND DAILY EVENTS -A NEED TO BE ORGANISED BUT AT THE SAME TIME STRUGGLE TO DO SO -FIND SOCIAL EVENTS HARD AND INTERACTING WITH OTHERS
33	anonymous	The behavioural patterns of Autism existing on a scale of mildly affected to severely affected being considered a spectrum onto which someone's behaviour level of autistic tendencies can be classified. People with ASD May view the world and their interactions with it differently to those who do not and therefor exhibit unusual behaviours.
34	anonymous	See above (15)
35	anonymous	See above
36	anonymous	As above
37	anonymous	As in Q 15
38	anonymous	If you insist in asking; social, communication- especially with others can be an issue, greater with boys as girls naturally seem to have better skills in interaction, repetition and obsessions are common, depending on the severity on the spectrum, things outside of a known routine can be challenging but not impossible handled and planned carefully ahead of time.

**22** If possible, can you explain your reaction further?

**Excessive fidgeting or repetitive use of an object (e.g. fidget spinner)**



ID	Name	Responses
1	anonymous	It does not bother me, I work with people with ASD and therefore am very used to seeing it
2	anonymous	Sorry. Please see above
3	anonymous	I fidget, and I know it irritates others, but as an outside looking in know its not something the person is doing to upset anyone they just feel more uncomfortable sitting still.
4	anonymous	I have a background in special educational needs at primary school level
5	anonymous	As I have a little experience of working with younger people with ASD diagnosis, I understand a little bit.
6	anonymous	I know that some of my behaviours are stimming activities. They usually happen when I am worried or nervous. Sometimes when I am thinking or mikes away and not thinking. If I do it, I totally accept others with similar traits.
7	anonymous	We all have our foibles. I noticed this person twitches their T-shirt when talking without eye contact.
8	anonymous	If you have an awareness you are more understanding.
9	anonymous	Recognised the need of this person to distract or deflect anxious feelings.
10	anonymous	I excessively fidget, skin pick, scratch etc. So I don't tend to notice when others are doing it as it is normal to me.
11	anonymous	I work with children that have a variety of developmental issues such as ADHD and ASD, as well as close family members that have a diagnosis so I am comfortable with this.
12	anonymous	This can be an example of stimming or self comforting
13	anonymous	It makes no difference to me how people choose to cope with life as long as it's not hurting themselves or anyone else. I just them do their thing in peace and get on with mine.
14	anonymous	it's usually very clear when someone is using something as a distraction method or a calming method, and so whatever helps them to relax makes absolutely no difference to me
15	anonymous	I recognise people have different conditions that they may be dealing with.
16	anonymous	I see it as sensory seeking to self regulate

ID	Name	Responses
17	anonymous	I feel there should be no reaction. How somebody manages the triggers of every day life is completely independent and if nothing else should inspire others to find there own coping mechanism
18	anonymous	You shouldn't judge other people for being different if someone were to be more fidgety etc it wouldn't effect me
19	anonymous	Behaviour described above is often behaviour myself and my children exhibit, although not diagnosed with any disorder. I understand how these behaviours may not be conscious or indeed within a person's control. I also understand that these behaviours may help with relieving stress or help to calm individual's in stressful situations.
20	anonymous	I work with some colleagues that have explained what they do and I why
21	anonymous	I have family members that have Autism.
22	anonymous	When I saw the individual acting the way they did I felt sorry for them, but also curious to what was wrong with them
23	anonymous	Everyone is different & we need to accept that
24	anonymous	I used to be uncomfortable but the more educated I am the easier it is to spot and more accepting I am of it
25	anonymous	It's the normal for me as my child was diagnosed at 1. If anything I'm curious of how Autism impacts other people
26	anonymous	I spent several years teaching ASD students in FE
27	anonymous	My youngest daughter as a young child often had to play with things in her hand to be able to concentrate on what teachers were explaining. Whilst not actually autistic did show a lot of signs which unfortunately teachers did not pick up on and just thought she was being badly behaved
28	anonymous	It seems to be very different now than it was I'm the 90s this is everywhere we all know someone with it. It's seems the new normal to having to deal with this
29	anonymous	My brother is diagnosed with autism, to much stimulation from the environment and information and he'll become distressed.
30	anonymous	Having watched in a school I understand why people need to this
31	anonymous	As someone who used fidget toys I found it nice to feel not alone
32	anonymous	I myself fidget a lot like this so I am completely accepting/understanding of it.

ID	Name	Responses
33	anonymous	I didn't have a reaction as such. I noticed the behaviour but continued with my day
34	anonymous	Because I understand that my Nephews Brain works differently.
35	anonymous	I observed repetitive behavior but didn't acknowledge or react to it (it was a professional situation and didn't warrant attention)
36	anonymous	I have worked with and supported young people with ASD and understand the need to stim and why they behave the way they do
37	anonymous	We all have our own issues to deal with and this should be respected
38	anonymous	I was raised not to point out differences but to embrace them, ask questions to understand them.
39	anonymous	I don't tend to dwell on others actions, if they are unusual to the norm it's not for me to decide
40	anonymous	My nephew has severe autism, is non verbal so we just accept him for who he is , not embarrassed by him or the way he acts
41	anonymous	As a teacher fidget toys allow children to focus
42	anonymous	You may want them to stop but know they can't/don't know they are doing it. They are probably feeling very uncomfortable
43	anonymous	I recognise that I do that behaviour at times, my son has had times in his life when he's suffered from a 'tick' so I don't tend to react unless I feel anxious about the behaviour
44	anonymous	I was previously a Support Worker for people on the spectrum, some of whom were severely affected and would lash out.
45	anonymous	I don't judge others.
46	anonymous	My daughter has profound additional needs with autistic tendencies.
47	anonymous	both accepting but occasionally uncomfortable for other people who don't recognise this could be ASD/other neuro behaviour
48	anonymous	Part of my previous job was to care for young people and adults with learning disabilities, e.g. autism, so I guess I am more used to these behaviours than I was before!
49	anonymous	Full respect to them

ID	Name	Responses
50	anonymous	Understand that everyone is different and autism is not something to be uncomfortable about
51	anonymous	My daughter is autistic. I am a school nurse and have worked with those with autism and other conditions since I was 14 years old
52	anonymous	I have worked with young people with varying SEN needs so I always try to look past the behaviours and at the person
53	anonymous	I understand that there are people that constantly need to fidget/move.
54	anonymous	Acknowledge behaviour but did not stare or make this obvious
55	anonymous	One has to be accepting of others afflictions and try to accept, understand and support them in the best way one is able to.
56	anonymous	I have understating and empathy around ASD as I have worked around this condition within my career it is a challenging condition for the person coping with it and the carers who support the individuals so I have massive empathy
57	anonymous	It's not really my place to make comment on someone else's behaviours, unless it's upsetting someone and I can do something about it, so it's sort of 'live and let live'
58	anonymous	I try to keep to myself.
59	anonymous	Know fidgeting probably helps them deal with the environment their in.
60	anonymous	Try to be understanding because they are having their challenges
61	anonymous	SEE IT AS SOMEONE JUST TRYING TO COPE IN THE SITUATION THEY FIND THEMSELVES IN
62	anonymous	I see it as that person reaction to the situation which is perfectly acceptable as long as it isn't hurting someone
63	anonymous	I am very little concerned in other people's behaviour unless it affects me directly.
64	anonymous	Not sure how someone is going to act or take you
65	anonymous	I am used to seeing children using similar strategies to help them focus or calm feelings of anxiety at school so it wasn't anything new.
66	anonymous	I taught lots of students on the spectrum so understand what to expect

ID	Name	Responses
67	anonymous	The first time I encountered it, I was un informed about the behaviour shown in Autism, so I guess I was surprised and a little shocked by the body language, there was no interaction with me or eye contact whilst having a conversation with said person and the parent.
68	anonymous	People are different and so we need to accept this
69	anonymous	Not sure this needs an explanation. We all react in different ways.
70	anonymous	Having worked with autistic children and adults with severe autism, a little fidgeting is unlikely to get anyone's attention, disruptive behaviour is more of what I've been used to and others reaction to this has been to stare or disapprove, comment sometimes rudely or move away. Personally I'm an accepting person because of my background (I also have an autistic nephew) and I'd be more likely to offer my help and support if felt it would be welcomed
71	anonymous	Close friend has a child who has ASD. Also when working spent time in a child development centre.
72	anonymous	I've worked with children with autism so have seen this behaviour
73	anonymous	Sympathy
74	anonymous	Peoples disability is often blind to those who don't understand that everyone is different, and because there is not always something visible to determine the disability, doesn't mean that that individual has difficulties, and need assistance..patience and understanding...
75	anonymous	If it doesn't effect anyone else then people shouldn't be worried about it
76	anonymous	I'm quite a fidgety person myself but I hold my urges back (masking?) So when I see other people do it I low-key get a sense of relief slightly. Like secondhand stimulation
77	anonymous	from my adhd i also do that so obviously accept
78	anonymous	I think I perceive behaviours like these to be normal as I'm quite fidgety myself
79	anonymous	Doesn't impact me unless it is loud or an irritating noise.
80	anonymous	Within my childhood and upbringing I have been surrounded with other neurodivergent people, so I have got a good understanding.
81	anonymous	Acknowledgement that it is probably autism or something similar, otherwise it would probably confuse me

25 If possible, can you explain your reaction further?

**Repeating sounds or phrases (said by others, film/TV quotes, made up) or loudly shouting, squealing or groaning**

ID	Name	Responses
1	anonymous	Same as above
2	anonymous	It can't be helped. Not the fault of the individual.
3	anonymous	As above, knowledge of the condition helps with the understanding
4	anonymous	As I have a little experience of working with younger people with ASD diagnosis, I understand a little bit.
5	anonymous	I have worked with children with these behaviours and have family members with diagnosed ASD. Everyone lives their lives differently. I know I repeat words and phrases, mainly in my head.
6	anonymous	A sudden noise always makes you look and when you see the context then can make you uncomfortable for looking as you don't want to be seen to be staring at the person or their carer or friends.
7	anonymous	Training, involvement in education.
8	anonymous	The person I saw known to me, so I wasn't surprised.
9	anonymous	It is not our place to judge others and being in public can be challenging for people with neurodivergence.
10	anonymous	See answer to q.22
11	anonymous	I would try to ignore or not react
12	anonymous	Again, people should be allowed to just be themselves in public. It makes no difference to me.
13	anonymous	To try and ignore it
14	anonymous	sometimes it can be a bit confusing, especially when i was younger. now i understand though, and i don't have any issue with it

ID	Name	Responses
15	anonymous	I used to work in an autism care home so the behaviour is fine to me.
16	anonymous	I have family who are autistic if it's there way of expressing how they feel it shouldn't be judged or look down on
17	anonymous	Whilst I understand and accept that individuals can display varying behaviours, it is (from my experience) rare to witness the above behaviours and so this has made me feel uncomfortable as it isn't something I have experience of first hand very often.
18	anonymous	I feel I understand having worked with children with different ranges of behaviour.
19	anonymous	As 21
20	anonymous	I understand they cannot help it and often it is their way of coping
21	anonymous	Sometimes annoying.
22	anonymous	When I was younger, at school some other kid used to bark in the lunch line. Obviously at a young age I just thought he was weird as I was aware of autism and the characteristics involved.
23	anonymous	Is it echolalia. I also find myself doing that and I believe as long as they are comfortable I'm comfortable
24	anonymous	I don't particularly care about peoples behaviours as long as they aren't damaging to others.
25	anonymous	Working within a nursery we had children with autism so I was used to comforting them and changing the environment to better suit their needs
26	anonymous	As above
27	anonymous	Sometimes uncomfortable, again not understanding why this is happening. Having a greater understanding can help you to accept
28	anonymous	As above

ID	Name	Responses
29	anonymous	As I've explained above, I do this from time to time - I actually know many people who do this
30	anonymous	As answer 22
31	anonymous	I don't judge others.
32	anonymous	Sympathetic towards parents dealing with an autistic child in public. Allow them space and time and not stare.
33	anonymous	Just felt sad for what they, and the family were going through
34	anonymous	Understanding. But when it's your daughter and you can't control these sounds you feel cross that others are staring , making comments etc
35	anonymous	Don't know whether to look or avoid looking
36	anonymous	both accepting but occasionally uncomfortable for other people who don't recognise this could be ASD/other neuro behaviour
37	anonymous	There have been times when someone has shown these behaviours and would not be due to a learning disability but more drugs, alcohol, etc. so sometimes I can be more cautious until I understand their situation a bit more in public.
38	anonymous	I have previously known and worked with individuals with ASD or other similar disorders, so understand and are familiar with some of these behaviours
39	anonymous	I think everyone to an extent does those things it just depends on the situation you are in. I know for a fact me and my friends will do that
40	anonymous	As long as the individual is not coming to harm or harming another person I see no issue with these behaviours, they are regulating and comforting to the individual
41	anonymous	Acknowledge behaviour but did not stare or make this obvious
42	anonymous	You have to understand that we are all different. We are all unique, so accept that individual for the person they are and the way they present themselves. If society was more accepting of each other we would be better equipped to support.



ID	Name	Responses
43	anonymous	I immediately realised they had some sort of additional needs. I felt sympathetic towards the carer.
44	anonymous	Occasionally if it comes from an adult shouting very loudly it initially is quite alarming until you work out what is going on! As we fear harm from someone appearing angry and loud
45	anonymous	Didn't clock that it was a sign of autism
46	anonymous	It's not really my place to make comment on someone else's behaviours, unless it's upsetting someone and I can do something about it, so it's sort of 'live and let live'
47	anonymous	Sometimes it can be uncomfortable to have someone shouting in public or repeating themselves. I try to keep to myself and ignore others unless they are in distress and need help.
48	anonymous	It's just their response to the environment. Some environments can be triggering to certain individuals.
49	anonymous	They are having their challenges
50	anonymous	At first, I looked to see what was happening but once I realised it wasn't dangerous carried on what I was doing
51	anonymous	I am very little concerned in other people's behaviour unless it affects me directly.
52	anonymous	I'm generally accepting to it but it can become annoying even if/when you know there is clearly something not quite right
53	anonymous	Worried that they may be aggressive or I am not sure what they are going to do
54	anonymous	We are socially conditioned to shy away from different behaviours. I try to be completely understanding but sometimes I admit to feeling alarmed and frightened of loud screams and shouts even though I know I shouldn't.
55	anonymous	See above
56	anonymous	As per answer of 22

<b>ID</b>	<b>Name</b>	<b>Responses</b>
57	anonymous	As previously explained I understand the reasons behind the above behaviours.
58	anonymous	Concern
59	anonymous	Social communications are not necessarily easy for everyone, and for those who need help and understanding is often the recipe for calm...
60	anonymous	It feels a bit out of control so it brings me discomfort when there's excessive noise
61	anonymous	At the time that I witnessed behaviours like these I probably felt uncomfortable as I didn't have any idea about autism etc. So I probably felt uncomfortable as I didn't know what was going on. However, now I understand more about autism, I would say I don't perceive these behaviours as 'strange' anymore, I just accept that someone's brain works differently and people react differently in different situations.
62	anonymous	Again, same as previous.
63	anonymous	Same as above

**28** If possible, can you explain your reaction further?

**Physical behaviours such as head-banging, body rocking, arm or hand flapping**

<b>ID</b>	<b>Name</b>	<b>Responses</b>
1	anonymous	Same as above
2	anonymous	It can't be helped. Not the fault of the individual.
3	anonymous	Knowledge is the key to understanding
4	anonymous	As I have a little experience of working with younger people with ASD diagnosis, I understand a little bit.

ID	Name	Responses
5	anonymous	Again, my reaction would be accepting because I would understand that the person was feeling anxious or having a meltdown. I'm a leg twitcher and I count my fingers (odd I know).
6	anonymous	See above.
7	anonymous	As I am used to this behaviour, I know that this is a stress induced response rather than an act of aggression.
8	anonymous	Again this is another example of stimming, I would usually try to ignore it unless they seemed in distress and/or alone then I would see if they need help
9	anonymous	I understood that they needed to to their actions to help them cope
10	anonymous	again when i was younger it confused me and i wasn't sure what it was, but now i do and i understand
11	anonymous	The same, sensory seeking to self regulate
12	anonymous	Saddened that the individual is struggling.
13	anonymous	Hand and arm flapping is something I've always done so again I don't think it should be looked at any differently
14	anonymous	Previously I have worked in an environment in which these behaviours have been common, however nowadays I work in a different field and am not exposed to this very often. This is why I would feel more uncomfortable.
15	anonymous	Accepting of the behaviour, though sometimes worried if they might hurt themselves.
16	anonymous	I felt sorry for the mother dealing with this & how people stare & pass comment, thinking its bad behaviour or bad parenting
17	anonymous	It's very hard to watch people hurt themselves when it can't be helped. It's hard to know if or how you should intervene
18	anonymous	As 21

ID	Name	Responses
19	anonymous	I feel sad that people are still having to live like this and the fact that medically nothing can be done to rewire their brains (as far as I am aware)
20	anonymous	Hard trying to calm people down
21	anonymous	Same story, as previous. In school walking to class, a different kid is banging their head against lockers.
22	anonymous	It's just their way
23	anonymous	I don't really think about it I see it as normal
24	anonymous	I don't particularly care about peoples behaviours as long as they aren't damaging to others.
25	anonymous	Smile to the parent
26	anonymous	don't want to judge the person for the reason they may have behind these behaviours- could be due to stimming etc or something else like substance abuse
27	anonymous	As above
28	anonymous	Again we are all different
29	anonymous	Compassion
30	anonymous	As a epileptic I have lived my life being stigmatised against, The understanding of epilepsy is exactly the same as autism , We are different so people avoid us when acting out is the ordinary!
31	anonymous	I feel sad that the persons body is going through that, and I feel concerned for them
32	anonymous	As per answer 22
33	anonymous	I don't judge,but if someone was causing themselves harm i.e headbanging ,I would check that they had a carer,pa, support worker,relative or friend with them before I decided to step in to help them calm .

ID	Name	Responses
34	anonymous	Concerned that my reaction may be in appropriate. Not knowing how / if I can or should offer help
35	anonymous	As the previous answer
36	anonymous	Feels awkward and alien to me.
37	anonymous	accepting because I am aware of these behaviours being ways to outwardly express (mildly or extremely) neurodivergence, but occasionally uncomfortable for other people who don't recognise this could be ASD/other neuro behaviour
38	anonymous	Understanding of behaviours due to previous work with Learning disabilities.
39	anonymous	Calm - it was my child
40	anonymous	As above - as long as the behaviour is not causing distress to the individual or to another then it does not concern me as I know they are regulating.
41	anonymous	Acknowledge behaviour but did not stare or make this obvious
42	anonymous	Again, accepting that individual for the person they are, different from you, unique but still a fellow human being in need of love, support and understanding.
43	anonymous	As above.
44	anonymous	Just fearing they would harm themselves and witnessing their anxiety is sometimes difficult to see
45	anonymous	It's not really my place to make comment on someone else's behaviours, unless it's upsetting someone and I can do something about it, so it's sort of 'live and let live'
46	anonymous	I am very little concerned in other people's behaviour unless it affects me directly and no one is being harmed.
47	anonymous	You want to help but can't, sort of like feeling helpless

ID	Name	Responses
48	anonymous	I think the same as above. Internally a bit alarmed and frightened, Internal 'flight' instinct.
49	anonymous	See above
50	anonymous	Surprised by the arm flapping
51	anonymous	As previously stated
52	anonymous	Yes, I've often been the carer in the above situation and have found that other people aren't as tolerant and can be very rude to me and to my clients, they've even laughed.
53	anonymous	Same as 22.
54	anonymous	Concern
55	anonymous	It is not for me or anyone to judge another, everyone one has adversaries in life, some find them easier than others to cope with, and this can often come out in a term of their frustration....
56	anonymous	Same answer as before: At the time that I witnessed behaviours like these I probably felt uncomfortable as I didn't have any idea about autism etc. So I probably felt uncomfortable as I didn't know what was going on. However, now I understand more about autism, I would say I don't perceive these behaviours as 'strange' anymore, I just accept that someone's brain works differently and people react differently in different situations.
57	anonymous	It is not necessarily in their control so I do not mind
58	anonymous	Same as above

**33, If yes, how would you explain it? – ASD**

ID	Name	Responses
1	anonymous	A series group of neurodivergent traits that make make it difficult for an individual to navigate social situations.

ID	Name	Responses
2	anonymous	A brain difference effecting behaviours it can manifest as anxiety over social situations that most people would consider acceptable. Some may find repetitive actions comforting as coping mechanisms. A very broad spectrum
3	anonymous	Brains are wired and work in a different way.
4	anonymous	It involves difficulties in communication, often through a literal understanding of ideas. Difficulties with social communication, not knowing what to say, how to begin a conversation and maintain it. Some people with Autism can lack empathy and imagination. Often people with Autism have special interests. Processing difficulties.
5	anonymous	Anxiety in social situations. Not understanding other people's feelings. Obsessive about objects or tv shows.
6	anonymous	As above
7	anonymous	It is a disorder that can affect behaviour and communication.
8	anonymous	See q.15
9	anonymous	Having differences in the way you process information about the world around you. Finding things overwhelming, and having differences in the coping strategies you'd use to process the information
10	anonymous	Already commented
11	anonymous	Neurodivergence which includes difficulties in managing sensory information, processing information and interpreting emotions
12	anonymous	A disorder that affects how people communicate, behave, process etc.
13	anonymous	As above (question 15)
14	anonymous	It can vary differently with different abilities. Masking is one I particularly have seen. Mutism another. Then loudness & shouting another.
15	anonymous	Differences in the brain/development. People may have difficulty in social situations, prone to anxiety have repetitive movements/ideas/speech.

<b>ID</b>	<b>Name</b>	<b>Responses</b>
16	anonymous	Same as previously described
17	anonymous	As above
18	anonymous	Where a person's brain is not wired in the conventional way
19	anonymous	Someone with behaviour problems this can be sounds noises
20	anonymous	It effects the person I know - Doesn't like change of routine Very organised Intense Happy with people he knows (High functioning)
21	anonymous	People's reactions may be different to what is acceptable to most people
22	anonymous	often described as a social disorder, but far more complex than this. affects the way someone processes information, emotion
23	anonymous	It's a developmental disorder that affects social interaction, interests as well as certain behaviours.
24	anonymous	A person with autism would see the world in a different way. Somethings we are used to may make that person uncomfortable in the space, hard or impossible to make an emotional connection
25	anonymous	As above.
26	anonymous	Generally they have problems with social communication, interaction. They can also have restricted or repetitive behaviours.
27	anonymous	...
28	anonymous	As above
29	anonymous	Social and communicational needs. Unable to recognise social cues and control emotions.
30	anonymous	See previous answer
31	anonymous	As above ,



<b>ID</b>	<b>Name</b>	<b>Responses</b>
32	anonymous	Differences in how the brain handles things causing challenges with interacting
33	anonymous	People with ASD brains are wired differently. Their perception and reactions to the world is different to me and you.
34	anonymous	It is just a different way of thinking, operating, communicating and cognitive functioning.
35	anonymous	See above
36	anonymous	Range of needs
37	anonymous	As question 19
38	anonymous	see Q 14 answer
39	anonymous	Autism Spectrum Disorder is a neurological and developmental disorder associated with learning difficulties and cognitive disorders.
40	anonymous	A neurological disorder which affects cognitive development In different ways
41	anonymous	Have we not already had this question?
42	anonymous	I feel this question has been asked already - please see answer above
43	anonymous	I could loosely describe it with the caveat I don't know exactly
44	anonymous	I have already stated before
45	anonymous	Neuropsychological disorder that results in differences in language, communication and behaviours
46	anonymous	It's a developmental disability caused by differences in the brain.
47	anonymous	As above.
48	anonymous	I believe I have explained this above

<b>ID</b>	<b>Name</b>	<b>Responses</b>
49	anonymous	Someone who suffers from any level of autism, which can affect their ability to process emotions, recognise emotions in others, process environmental stimulus etc
50	anonymous	A spectrum disorder that affects the ability of someone to process social interactions and situations.
51	anonymous	An individual who does not react or behave 'typically' to the environment their in.
52	anonymous	SOMEONE HAS DIFFICULTIES WITH CERTAIN PARTS OF EVERYDAY LIFE TO ONE DEGREE OR ANOTHER
53	anonymous	A difference in the development of the brain causing the world and interactions with it to be viewed differently to the average and therefore unusual behaviours may be seen
54	anonymous	As above
55	anonymous	See previous answer
56	anonymous	Neurodevelopmental conditions of varying severity
57	anonymous	As previously stated
58	anonymous	See answer 15
59	anonymous	Please refer to question 14 and 18 - repeat question
60	anonymous	As above.
61	anonymous	People see the world differently
62	anonymous	Fixations, phobias
63	anonymous	An. Individuals challenges in life, in terms of learning everyday skills, that many take for granted
64	anonymous	I only know a bit about it. I know that differences in the brain affect brain functioning which causes certain behaviours. And I understand some of the behaviours displayed by people with ASD are things like having

ID	Name	Responses
		challenges with social interactions and differences in things like facial expressions. And liking to stick to rules and routines.
65	anonymous	I think it's autism, looking into how there is a spectrum that everyone sits on. It is a neurological disorder which means people are hypersensitive to things such as changes in their schedule or loud noises, struggle with reading emotions etc

**35,** If yes, what kind of topics were covered and where did you receive this training – acceptance training or education on neurodivergence

ID	Name	Responses
1	anonymous	My workplace, I was taught about how to manage mental health and autism
2	anonymous	In education. Mainly to do with helping children to cope in situations that may prove challenging depending on their needs, identifying triggers and setting coping measures. Family support
3	anonymous	Adaptations for the classroom and as below for ASD. Really not enough training in ADHD.
4	anonymous	A long time ago when I was teaching - 15 years! Sorry Lauren, my brain doesn't go that far back to remember the detail.
5	anonymous	At work as part of inclusion and diversity development training. Topics include recognition, acceptance, engagement, support etc..
6	anonymous	I work in forensic mental health so it comes in part with our training. But it something we learn to accept and understand as we care for many people with many disorders.
7	anonymous	Workplace - autism / ADHD Level 3 diploma in Understanding Autism. Child mental health - workplace Behavioural support advice - workplace
8	anonymous	SEN training during PGCE, continued SEN CPD as a teacher.
9	anonymous	Own research for my private therapy practice and cross overs with SPS
10	anonymous	When I was working as a teaching assistant in a secondary school. Ways to deal with melt downs, ways to approach subjects

ID	Name	Responses
11	anonymous	I studied understanding the autistic spectrum with the open university it was a free course to help people understand a little more into how people with autism react to certain things
12	anonymous	Workplace elearning
13	anonymous	I would have had some training years ago but felt it was never enough.
14	anonymous	Part of a M.Ed course
15	anonymous	Education workplace
16	anonymous	It was a couple of hours in a workplace training session. Can't remember much of it, except - as a manager - to recognize that some people may need accommodating (eg placement of their desk/how their desk is oriented in the room, etc) and to be sensitive to these needs
17	anonymous	Education
18	anonymous	Workplace
19	anonymous	Workplace
20	anonymous	Healthcare checks for people with learning disabilities, differences in children/adults with learning disabilities.
21	anonymous	Usually very "classic" autism that is discussed - white, male child, non verbal, no eye contact and engaging in repetitive play. It would be great to have more awareness of the spectrum of neurodivergence and particularly how it presents differently in girls.
22	anonymous	As a careers adviser I attended a webinar on it relating to my careers role mainly in education.
23	anonymous	Unofficial from a dr who I worked for an understanding of how to manage behaviours Rehearse routines for the child to feel safer Reassurance Avoidance of stress within the daily routine Attachment
24	anonymous	Neurodivergence in health care from a previous job
25	anonymous	Third year module on sensory perception and neurodevelopmental conditions. However don't feel like it was labelled as neurodivergence

ID	Name	Responses
		mainly looked into types of neurodiversity like ADHD, ASD and OCD individually.
26	anonymous	NA
27	anonymous	Acceptance training? I have had training about autism but it wasn't called this.
28	anonymous	Lots of training over many years from various people/organisations. Mostly we were told about certain behaviour traits and given suggestions of how to deal with them. For example, we were taught to phrase instructions carefully, so instead of saying "Don't run" we should say "Please walk" so that the focus was on the action required not the one to be avoided.
29	anonymous	Work based training Explanation of ASD
30	anonymous	Limited awareness briefing at Governors meetings
31	anonymous	I worked in a local support unit for the nhs, so worked based training- life changing head injuries, epilepsy, autism and spectrum associated disorders
32	anonymous	School - asd, dyslexia

**36, If no, would you like to and why? – neurodivergence**

ID	Name	Responses
1	anonymous	I would, just because it's can help be more empathetic towards those who have neurodivergence
2	anonymous	Yes, it would be particularly helpful for me in my job role
3	anonymous	yes, i think it is something that especially workplace settings should be aware of
4	anonymous	Neurodivergence is important to understand and I would welcome training as I feel it would enhance my ability to interact and understand others.

<b>ID</b>	<b>Name</b>	<b>Responses</b>
5	anonymous	I don't know if I would like to or if I plan to
6	anonymous	Yes as never had an opportunity before and would like to understand more.
7	anonymous	No not really
8	anonymous	I would be interested in hearing advances made in this area
9	anonymous	Feel I am too old
10	anonymous	Never had to
11	anonymous	I'm alright, learnt a lot from my diagnosed brother and suspected second brother.
12	anonymous	I think it would have been extremely beneficial when I was younger to slow me to be more understanding of people's differences. I believe it would be a brilliant thing to implement into school curriculum
13	anonymous	I think everyone should have training in how to accommodate all disabilities including bsl to be taught in schools
14	anonymous	yes, i think this would be beneficial for general understanding of neurodivergence
15	anonymous	No I feel I am well educated enough on the topic apart from maybe a few of the rarer conditions.
16	anonymous	Yes
17	anonymous	Yes, my son is going through the diagnostic process at present
18	anonymous	No , I don't have time
19	anonymous	Yes... Becoming more widely known and accepted
20	anonymous	Selfishly I don't have time

ID	Name	Responses
21	anonymous	Yes to make me better understand why people with neurological illnesses are misunderstood
22	anonymous	I believe we need to change society to recognise we are all different
23	anonymous	Yes, to further understand
24	anonymous	Yes I would always like to keep up to date with learning about others.
25	anonymous	Would be interested to know more but not directly relevant to my current job
26	anonymous	not particularly
27	anonymous	To understand better.
28	anonymous	Maybe. I have done awareness training before for other mental health issues so it would help take some of the fear from it.
29	anonymous	yes, feel it's v. relevant
30	anonymous	I'm open to learning new things - especially if it is relevant to myself and my peers
31	anonymous	Yes, I would like to experience more training and teaching related to neurodivergence to help me understand different individuals better in a personal and working environment
32	anonymous	I feel I don't need any training
33	anonymous	Of course. Always keen to learn about what many individuals go through everyday.
34	anonymous	I wouldn't be looking to partake in training. I have interacted with people with various disabilities over the years. By taking a relaxed approach and looking to their friends/families/careers for guidance if needed I haven't felt I've done the person a disservice.
35	anonymous	Yes I feel it would be beneficial to understand more about the nature of the disorders and to consider the emotions of people with neurodivergency

ID	Name	Responses
36	anonymous	Yes. I think it would help my job and help in general. There are more and more people being diagnosed so I think it's something that everyone should be aware of.
37	anonymous	Maybe I'm looking at courses atm to see what best suits my work
38	anonymous	Yeh it's part of society so we need to be educated on it
39	anonymous	Yes, it could be helpful to understand neurodivergence in order to be more inclusive of someone with this disability.
40	anonymous	Wouldn't mind as good to know about these things to have a better understanding
41	anonymous	WOULD LIKE TO TRY TO LEARN MORE ABOUT THIS
42	anonymous	Yes, I think having a better understanding would make me a better person
43	anonymous	I have read some books and watched some documentaries about neurodivergence and found it interesting to learn in this form.
44	anonymous	Yes. To understand people better and how I should behave or respond to help
45	anonymous	No
46	anonymous	Not really
47	anonymous	Not sure
48	anonymous	Not particularly as I don't see it as a hugely pressing issue that those unaffected/disconnected from the disorder should learn about it. If people were to be diagnosed or know someone who might be diagnosed it would help if they then received training
49	anonymous	Yes absolutely!! I think it's so so important for our society to accept people and make everyone feel equal and included. Unless people are educated this won't happen.



ID	Name	Responses
50	anonymous	Yes, i think it's important to understand this and get training on how to handle it either as an individual with it or handling/helping others with it.
51	anonymous	Yes I would, I think a lot more people are more neurodivergent than people expect. And we should all have the knowledge on how to make sure these people have comfortable environments and feel safe.
52	anonymous	I guess I'd need to know what it is first

**38,** topics were covered and where did you receive this training (e.g., education or workplace settings)?  
- ASD

ID	Name	Responses
1	anonymous	Same as above
2	anonymous	Only through knowledge and understanding
3	anonymous	Typical ASD behaviours and how the child might be feeling and best ways to support. Received at school (workplace - when I was working)
4	anonymous	The features of autism. Ways to communicate with pupils with autism. Classroom adaptation. Probably loads more, but I can't remember. In school as a teacher.
5	anonymous	As above.
6	anonymous	Education setting whilst working. Understanding, strategies, resources , working with families
7	anonymous	Again I work in forensic mental health so it comes under training there.
8	anonymous	Workplace - autism / ADHD (covering educational needs and support, managing behaviour, adapting the environment, triggers, mental health, social difficulties, speech and language). Level 3 diploma in Understanding Autism. Child mental health - workplace Behavioural support advice - workplace
9	anonymous	PGCE - symptoms and strategies

ID	Name	Responses
10	anonymous	I worked in a special needs school for a long time supporting children with a range of disabilities, including ASD
11	anonymous	Same as above
12	anonymous	ASD is important to understand and I would welcome training as I feel it would enhance my ability to interact and understand others.
13	anonymous	Education. Covered a variety of topics but never really clear enough to be able to make a difference.
14	anonymous	As above
15	anonymous	Education workplace
16	anonymous	Open university
17	anonymous	training as part of my university widening participation ambassador role where i will be working with autistic young people fortnightly for several weeks
18	anonymous	As above
19	anonymous	Education / online / workplace
20	anonymous	Education
21	anonymous	How people with ASD see the world and how to support and better understand them and their behaviour. Workplace training.
22	anonymous	Work
23	anonymous	Education (university psych degree), definition of ASD, symptoms, neurological differences, diagnosis, etc.
24	anonymous	I have experienced basic training specifically relating to autism, through a workplace, which discussed behaviours to look out for and how to react in different unique cases
25	anonymous	I paid for training myself to better understand my daughter. This focused more on anxiety, demand avoidance and sensory regulation

ID	Name	Responses
26	anonymous	It was a very long time ago, I can't really remember what was discussed specifically. It was for work as a careers adviser
27	anonymous	Yes I feel it would be beneficial to understand more about the nature of the disorder and to consider the emotions of people with ASD. It may help me to accommodate individuals in scenarios they may feel uncomfortable with which I was not aware of
28	anonymous	The training was on a Primary school many years ago - I can't really remember much about it. One thing that did strike me was that once a child has been diagnosed with autism, the diagnosis can't be removed. So it's really important to get the diagnosis correct
29	anonymous	A specific module in the bracket of people with extra needs in health care
30	anonymous	Third year module on sensory perception and neurodevelopmental conditions. Looked into the impact on daily life and assessments.
31	anonymous	NA
32	anonymous	Understanding ASD and learning how best to communicate and help children to access their learning.
33	anonymous	See above
34	anonymous	As above
35	anonymous	See above
36	anonymous	Yes at my workplace, diversity, support, appropriate language, strengths set, focus, non-judgemental
37	anonymous	Briefly covered during degree, long time ago.
38	anonymous	Can't remember as a long time ago

**39,** If no, would you like to and why? - ASD

ID	Name	Responses
1	anonymous	I would, just because it's can help be more empathetic towards those who have neurodivergence
2	anonymous	Yes, as an extension to previous training/mentoring.
3	anonymous	Yes, it would be particularly helpful for me in my job role
4	anonymous	yes, i think it is something that especially workplace settings should be aware of
5	anonymous	Always good to increase understanding
6	anonymous	Yes as never had an opportunity before and would like to understand more.
7	anonymous	Long retired but try and keep up with issues
8	anonymous	Too old
9	anonymous	Again I haven't had to
10	anonymous	I would like to as I am not entirely sure what ASD is and would like to understand it better.
11	anonymous	I feel like I would only if it was someone with asd teaching as an allistic teacher I wouldn't feel like they new what they were talking about as much
12	anonymous	yes, i think this would be beneficial for general understanding of ASD
13	anonymous	No I feel I understand ASD enough that I wouldn't need training.
14	anonymous	No
15	anonymous	See previous response
16	anonymous	As above
17	anonymous	Same answer as above

<b>ID</b>	<b>Name</b>	<b>Responses</b>
18	anonymous	Yes, to fully understand
19	anonymous	Yes always open to further training,skills and knowledge.
20	anonymous	no
21	anonymous	Yes to understand better
22	anonymous	Just to feel calmer and less anxious when I come across it
23	anonymous	yes, feel it's v. relevant
24	anonymous	I'm open to learning new things - especially if it is relevant to myself and my peers
25	anonymous	As Q:36
26	anonymous	All schools should teach it.
27	anonymous	Yes, it could be helpful to understand the disorder in order to be more inclusive of someone with this disability
28	anonymous	Ok to have a better understanding of these conditions
29	anonymous	AGAIN WOULD LIKE TO TRY TO LEARN MORE
30	anonymous	Yes, so I would understand and potential help
31	anonymous	Yes I would be happy to. I am always interested to learn more.
32	anonymous	Yes. To be better informed and understand people and difficulties they have
33	anonymous	Not really
34	anonymous	Not sure
35	anonymous	Not particularly as I don't see it as a hugely pressing issue that those unaffected/disconnected from the disorder should learn about it. If

ID	Name	Responses
		people were to be diagnosed or know someone who might be diagnosed it would help if they then received training
36	anonymous	Same answer as above!
37	anonymous	Yes
38	anonymous	Yes, i think it's important to understand this and get training on how to handle it either as an individual with it or handling/helping others with it.
39	anonymous	Again, as previously stated.
40	anonymous	Yeah probably a good idea as it's not uncommon

**41**, topics were covered and where did you receive this training (e.g., education or workplace settings)?  
– MENTAL HEALTH

ID	Name	Responses
1	anonymous	I did a degree in mental health nursing
2	anonymous	In an education setting for small children. Understanding it is involuntary and taking individual cases to learn triggers and appropriate coping strategies
3	anonymous	How to support/promote general emotional well being in children. Basic grief support.
4	anonymous	I've had CBT (several times), but no formal mental health training. The CBT was before my diagnosis.
5	anonymous	Eating disorders, suicide and self harm, personality disorder, addiction, working in forensic mental health these things are covered in training.
6	anonymous	Child mental health. - Suicide/ depression / eating disorders/ psychological disorders. At the Hub, Trowbridge. (Workplace course).
7	anonymous	I trained as a registered mental health nurse for 3 years. Covered common mental illnesses such as anxiety, depression, psychosis, eating disorders, personality disorders, and treatments.

<b>ID</b>	<b>Name</b>	<b>Responses</b>
8	anonymous	Various topics under workplace training.
9	anonymous	I deliver mental health training
10	anonymous	Workplace
11	anonymous	Everything! I am a mental health first aider
12	anonymous	I took part in a suicide prevention course to help those with Suicidal thoughts it went into depths on mental health disorders and how different ones effect you
13	anonymous	Workplace mental health first aid training
14	anonymous	I worked in a mental health care home. Everything was covered
15	anonymous	How to look after your own mental health. How people deal with their own mental health differently. An overview of the most common mental health problems and how they present themselves. This training was given to me at a workplace.
16	anonymous	Well being, resilience and stress related issues
17	anonymous	Depression , dementia , adhd , schizophrenia, , trauma etc
18	anonymous	Crisis and suicide management
19	anonymous	University
20	anonymous	Dementia training Emotional intelligence- being aware of one's own emotions.
21	anonymous	In my nursing training
22	anonymous	All the basics of university courses
23	anonymous	Workplace
24	anonymous	Types of mental illness eg: bipolar, manic depression, self harm, addiction, personality disorders. Workplace setting.

ID	Name	Responses
25	anonymous	In the workplace and in general life I have learnt about mental health, learning disabilities and have studied mental health first aid and an introduction to counseling. In my personal life I have received counseling.
26	anonymous	Workplace, acceptance and supporting colleagues
27	anonymous	Suicide awareness. Work
28	anonymous	I did a distance learning course on awareness of Mental Health problems through working at a housing association.
29	anonymous	work training - but basic...depression, anxiety, schizophrenia, bipolar, psychosis, basic ASD/Asbergers...etc
30	anonymous	At university during psych degree, learnt about mental health disorders, PTSD, depression, schizophrenia, etc.
31	anonymous	I have discussed mental health in depth through my uni course in Psychology, and have also experienced training discussing depression, anxiety and suicide, through a volunteering role
32	anonymous	Workplace setting, how mental health can be beneficial in every form of like not just work
33	anonymous	Workplace as a school nurse I have done a lot of training in the area of mental health
34	anonymous	Education setting - nightline. Topics regarding anxiety depression and suicide
35	anonymous	In a primary school - the focus was on keeping mental health healthy. 10 things you can do to improve your mental health daily.
36	anonymous	I've trained in introductory counselling skills and studies
37	anonymous	Mental health in health care, so covered alcoholism, anxiety, depression, suicidal ideation etc
38	anonymous	NA



<b>ID</b>	<b>Name</b>	<b>Responses</b>
39	anonymous	Workk
40	anonymous	Workplace mental health training
41	anonymous	Multiple and much more so in recent years. Taught to recognise behaviour traits for depression/abuse/autism
42	anonymous	Mental Health First Aider plus other Various training courses and publications as well as first hand experiences within my HR role
43	anonymous	Workplace, associated with young adults with severe physical disabilities after I left the autism unit, this training was for adults with no brain impairment, mental issues arise, depression being a factor in accepting their restricted physical limitations.
44	anonymous	Trauma and impact
45	anonymous	Work
46	anonymous	Household

**42** f no, would you like to and why? – MENTAL HEALTH

<b>ID</b>	<b>Name</b>	<b>Responses</b>
1	anonymous	yes, i think it is something that especially workplace settings should be aware of
2	anonymous	Mental health issues cover a vast array of conditions etc. I feel that there is much to learn and explore when it comes to mental health.
3	anonymous	I'm retired now but feel I do have some understanding of Mental health issues.
4	anonymous	No
5	anonymous	As above
6	anonymous	Was just not talked about during my main working life. Much more talked about now.

<b>ID</b>	<b>Name</b>	<b>Responses</b>
7	anonymous	Help deal with our feelings and how to be with others
8	anonymous	Yes I would love to, it would help me to understand not only others, but myself better.
9	anonymous	I would so I could understand my brain better
10	anonymous	i think this should be standard in schools, as well as accessible courses for adults, possibly subsidised by employers to improve mental wellbeing
11	anonymous	No
12	anonymous	I can signpost people to where help is but I don't have the capacity to learn this myself
13	anonymous	Would be interested to understand more about mental illnesses
14	anonymous	Yes. To have more understanding
15	anonymous	yes, very relevant
16	anonymous	I'm open to learning new things - especially if it is relevant to myself and my peers
17	anonymous	If it would help in my work place and the people around me, then yes
18	anonymous	Yes it's a necessity
19	anonymous	Yes. Understanding mental health can help create a more inclusive society.
20	anonymous	Would be ok to be able to help someone who might have a need
21	anonymous	ALWAYS GOOD TO TRY TO LEARN MORE
22	anonymous	Yes, official training is a lot better than people's opinion and I'd like to understand it properly
23	anonymous	Yes. Always happy to Learn more.

ID	Name	Responses
24	anonymous	Yes. To be more understanding and perhaps less fearful
25	anonymous	Perhaps in the future?
26	anonymous	Not really
27	anonymous	Not sure
28	anonymous	Not particularly as I don't see it as a hugely pressing issue that those unaffected/disconnected from the disorder should learn about it. If people were to be diagnosed or know someone who might be diagnosed it would help if they then received training
29	anonymous	Yes. The more I get taught about behaviours of autistic people, the less I fear I feel surrounding their behaviours I don't understand
30	anonymous	Yes deffo, for the same reasons as above. Everyone should feel included and supported.
31	anonymous	Yes, i think it's important to understand this and get training on how to handle it either as an individual with it or handling/helping others with it.
32	anonymous	There have been lots of instances where I have had friends/family struggling with mental health, and I feel like I want to be able to have more training in how I can support them whilst also maintaining my own boundaries. The NHS is under crisis, and people aren't getting the support they need from professionals fast enough.
33	anonymous	Same as above, probably a good idea