Autism Spectrum Disorder

Diagnostic Criteria (DSM-5/DSM-5-TR)

A. Persistent deficits in social communication & interaction across contexts, shown by **all**:

- **Social-emotional reciprocity** deficits (e.g., atypical approach; poor back-and-forth conversation; reduced sharing of interests/emotions; failure to initiate/respond).
- **Nonverbal communicative** deficits (poor integration of verbal/nonverbal cues; atypical eye contact, gestures, prosody; limited or absent facial expression/nonverbal communication).
- **Relationship** deficits (difficulty adjusting behavior to context; trouble with imaginative play or making friends; little interest in peers).

B. Restricted, repetitive patterns (≥ **2**, current or by history):

- **Stereotyped/repetitive** movements, use of objects, or speech (motor stereotypies; lining up toys; flipping objects; echolalia; idiosyncratic phrases).
- **Insistence on sameness**, inflexible routines, ritualized verbal/nonverbal patterns (distress at small changes; transition difficulties; rigid thinking; greeting rituals; same route/foods).
- **Highly restricted, fixated interests** (abnormal intensity/focus; strong attachment to unusual objects; circumscribed/perseverative interests).
- **Hyper-/hyporeactivity to sensory input** or unusual sensory interests (indifference to pain/temp; adverse responses to sounds/textures; excessive smelling/touching; fascination with lights/movement).

C. Symptoms present **in the early developmental period** (may fully manifest later or be masked).

D. Symptoms cause **clinically significant impairment** in social, occupational, or other important areas.

E. Not better explained by **intellectual developmental disorder** or **global developmental delay**. If co-occurring, social communication is **below** that expected for general developmental level.

Crosswalk note: Prior DSM-IV diagnoses of autistic disorder, Asperger's disorder, or PDD-NOS → diagnose **ASD**. If marked social communication deficits **without** Criterion B, consider **Social (Pragmatic) Communication Disorder**.

Severity Levels (Table 2 — rate each domain separately)

Level 3 – "Requiring very substantial support"

- **Social communication:** Severe deficits, minimal initiation, minimal

response even to direct approaches.

- **RRBs:** Marked interference across settings; extreme distress/difficulty changing focus/action.

Level 2 – “Requiring substantial support”

- **Social communication:** Marked deficits even with supports; limited initiation; atypical responses.
- **RRBs:** Frequent/obvious to casual observer; interfere across contexts; distress/difficulty with changes.

Level 1 – “Requiring support”

- **Social communication:** Noticeable impairments without supports; difficulty initiating; atypical/unsuccessful responses; attempts to make friends are odd.
- **RRBs:** Inflexibility causes significant interference in one or more contexts; difficulty switching; organizational/planning problems.

Recording tip: You can note **different levels** for Social Communication vs RRBs

(e.g., “very substantial support” for SC and “substantial support” for RRBs).

Specifiers

- **With/without accompanying intellectual impairment.**
- **With/without accompanying language impairment** (record current verbal level: none, single words, phrase speech, full sentences, fluent; consider receptive vs expressive).
- **Associated with a known genetic/medical condition or environmental factor** (e.g., Rett, fragile X, Down syndrome, epilepsy; fetal valproate, alcohol, rubella) — **add an additional code** for the condition.
- **Associated with a neurodevelopmental, mental, or behavioral problem** (e.g., irritability, sleep problems, SIB, developmental regression) — also diagnose co-occurring disorders when criteria met.

- **With catatonia** — add code **F06.1 catatonia associated with ASD**.

Diagnostic Features (high-yield)

- Core: **persistent social-communication impairment (A)** + **restricted/repetitive patterns (B)** from early childhood, limiting functioning (C,D).
- Presentations vary by **severity, age, language, intellectual level, gender, supports**; some individuals mask symptoms.
- Social-communication deficits can be subtle in verbally fluent individuals; RRBs may appear “age-typical” in topic but are **abnormal in intensity/flexibility**.
- ASD includes historical labels: early infantile autism, Kanner’s, high-functioning autism, atypical autism, PDD-NOS, childhood disintegrative disorder, Asperger’s.

Associated Features

- Frequent **intellectual and/or language impairment**; uneven cognitive profiles; gap between IQ and adaptive skills.
- Common: **theory-of-mind**, **executive function**, and **central coherence** difficulties.
- **Motor** differences (odd gait, clumsiness, toe walking); **self-injury** can occur; **catatonic-like** slowing/freezing possible; **adolescent risk** period for full catatonia.
- **Medical** associations common (e.g., epilepsy, constipation).

Prevalence (summary points)

- U.S. estimates **~1–2%** overall; global median ~**0.62%**; male:female ~**3:1**.
- Later/missed diagnoses and misdiagnosis occur in some

ethnoracially marginalized groups.

Development & Course

- First signs in **early childhood**; often recognized **12–24 months** (earlier if severe, later if subtle).
- Common early features: **language delay**, reduced social interest, unusual social interactions, odd play, atypical communication.
- **Prospective** data: declines in social/communication behaviors in first **2 years** typical in ASD (rare in other NDDs).
- **Regression** after ≥2 years normal development is **rare** (consider encephalopathic conditions like continuous spike-wave during sleep, Landau-Kleffner).
- Not degenerative; learning/compensation continue; many improve in later childhood; adolescent outcomes vary.

- Adults: variable independence; may use **compensation/masking** but at **stress/anxiety** cost; vocational supports improve outcomes.

Risk & Prognostic Factors

- **Best predictors:** presence/absence of **intellectual disability**, **language impairment** (functional language by age 5 is favorable), and **additional mental health problems**; comorbid **epilepsy** → poorer verbal ability.
- **Environmental risks (broad):** advanced parental age, extreme prematurity, certain in-utero exposures (e.g., **valproate**, teratogens).
- **Genetic/physiological:** high **heritability** (~37–90%; recent estimate ~80%); ~**15%** linked to identifiable genetic variants; risk largely **polygenic**; incomplete penetrance.

Culture-/Sex-/Gender-Related Issues

- Cultural norms affect perception but impairments are **marked relative to cultural context**.
- Diagnostic delays/misdiagnosis more common in some marginalized groups.
- **Males diagnosed 3–4×** more often; **females** may be diagnosed later, show more masking, fewer obvious RRBs, and more often have ID/epilepsy in clinic samples.
- Increased **gender variance** rates reported within ASD populations.

Suicide Association

- **Elevated risk** of suicidal thoughts/behaviors and death; impaired social communication in childhood linked to higher self-harm/suicidality by adolescence.

Functional Consequences

- Early: learning hampered by social-communication deficits; routines/sensory sensitivities complicate daily care; adaptive skills < IQ.
- School: planning/organization/rigidity reduce achievement, even with high IQ.
- Adult: challenges with independence, novelty; higher risks with co-occurring conditions; drowning is leading accidental death in children with ASD.

Differential Diagnosis (key separations)

- **ADHD:** shared attentional/social difficulties, but **no RRBs** required for ADHD; co-diagnosis common.
- **Intellectual developmental disorder (without ASD):** diagnose ASD **only if** social communication is **below** level of other nonverbal skills.

- **Language disorders / Social (Pragmatic) Communication Disorder:** S/L disorders lack **abnormal nonverbal communication** and **RRBs**; if RRBs present → ASD supersedes SCD.
- **Selective mutism:** normal development; situational speech; **social reciprocity intact**; no RRBs.
- **Stereotypic movement disorder:** don’t add if explained by ASD; add if self-injury is a **focus of treatment**.
- **Rett syndrome:** transient ASD-like phase; later social communication improves—diagnose ASD only if full criteria met.
- **Anxiety disorders:** overlap in withdrawal/repetitive behaviors; consider context and core ASD features.
- **Obsessive-compulsive disorder:** OCD compulsions relieve anxiety

from intrusive thoughts; ASD RRBs often **pleasurable/self-soothing** and include stereotypies/insistence on sameness.

- **Schizophrenia:** hallucinations/delusions define schizophrenia, not ASD; onset course differs; co-diagnosis possible.
- **Personality disorders (narcissistic/schizotypal/schizoid):** review **early developmental** history (imaginative play, RRBs, sensory sensitivities) to differentiate.

Comorbidity (common)

- **Intellectual developmental disorder**, **language disorder**, **specific learning disorders**, **developmental coordination disorder**.
- **Psychiatric: ADHD**, **anxiety disorders**, **depression** (high rates; ~70% ≥1 comorbid, ~40% ≥2).

- **Feeding:** avoidant/restrictive food intake; extreme/narrow food preferences.
- In nonverbal/limited language individuals, **changes in sleep/eating or behavior** should prompt evaluation for **anxiety/depression** and medical/dental pain.

Recording Procedures (documentation tips)

- Note **separate severity levels** for **Social Communication** and **RRBs**.
- Then record **intellectual impairment** specifier, followed by **language impairment** with current verbal level.
- If associated genetic/medical/environmental factors or other neurodevelopmental/mental/behavioral problems are relevant, **record "ASD associated with …"** and

code the condition when applicable.

- If **catatonia** present, **record separately** “catatonia associated with ASD” and add **F06.1**.

Quick Symptoms List (flash review)

- Social reciprocity deficits; atypical nonverbal cues; relationship difficulties.
- Repetitive motor/speech/object use; need for sameness/routines; narrow/high-intensity interests.
- Sensory hyper/hyporeactivity or unusual sensory interests.
- Early onset; clinically significant functional impairment.