# Critical and Creative Thinkers

Gifted 101

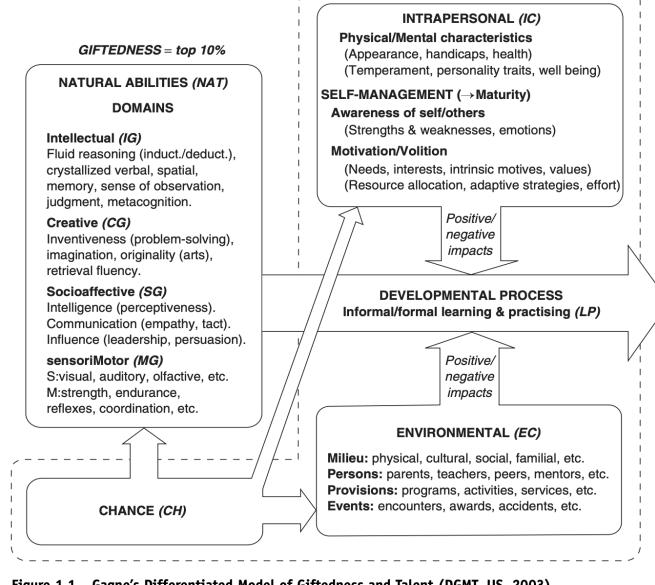
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## What's to know?

- Definition
- Identification
- Incidence
- Accommodations
- Support

### Definition

- Children are gifted when their ability is significantly above the norm compared to their age peers. (NAGC US) [1]
- There is no universally accepted definition of students identified as gifted and talented. A common understanding is that giftedness and talent in students result in their displaying a selection of characteristics at home and school that are significantly above the average for their age. (ACv9) [2]
- The possession and use of untrained and spontaneously expressed natural abilities (called outstanding aptitudes or gifts), in at least one ability domain, to a degree that places and individual at least among the top 10% of age peers (Gagne, 2004) [3]
- [14]



CATALYSTS -----

TALENT = top 10%

#### SYSTEMATICALLY DEVELOPED SKILLS (SYSDEV)

#### **FIELDS**

(relevant to school-age youths)

Academics: language, science, humanities, etc.

Arts: visual, drama, music, etc.

Business: sales, entrepreneurship,

management, etc.

Leisure: chess, videogames,

puzzles, etc.

Social action: media, public

office, etc.

Sports: individual & team.

Technology: trades & crafts, electronics, computers, etc.

Figure 1.1 Gagne's Differentiated Model of Giftedness and Talent (DGMT, US, 2003)

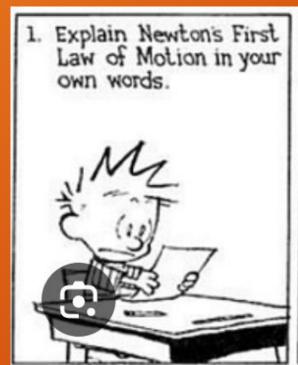
#### Policies for Gifted Education

- Policies and guidelines available but not always adhered to
- Minimal policies and guidelines available [4,5,6,13,]

#### Identification - characteristics

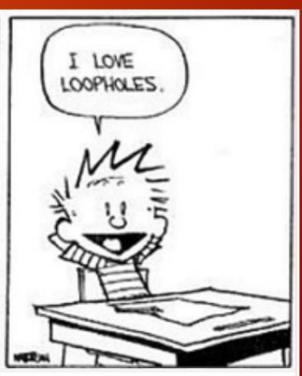
- Curious thirst for knowledge
- Fewer repetitions required for mastery
- Great memory
- Abstract reasoning
- Enjoys complexity, ambiguity and discrepancies
- Mature sense of humour
- Sensitive to social injustices emotional intensity
- Not focused on high achievement (next slide) the unappreciated A (Kingore, 2004) [7]
- Gifted learners prefer idea-mates rather than age-mates. They enjoy the company of peers when the peer group understands the shared ideas
- [18]

## Being creative to add interest









or



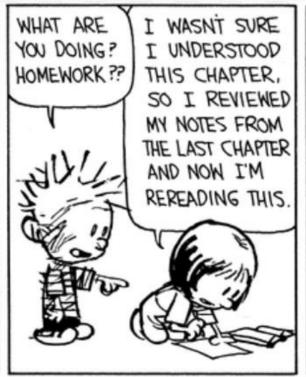
There were occassional moments when she questioned her decision to work with truly gifted students.

| A High Achiever                            | A Gifted Learner   | A Creative Thinker   |  |
|--|--|--|--|
| Remembers the answers.                     | Poses unforeseen questions.                                | Sees exceptions.   |  |
| Is interested.                             | Is curious.  | Wonders.   |  |
| Is attentive.                              | Is selectively mentally engaged.                           | Daydreams; may seem off task.                                |  |
| Generates advanced ideas.                  | Generates complex, abstract ideas.                         | Overflows with ideas, many of which will never be developed. |  |
| Works hard to achieve.                     | Knows without working hard.                                | Plays with ideas and concepts.                               |  |
| Answer the questions in detail.            | Ponders with depth and multiple perspectives.              | Injects new possibilities.                                   |  |
| Performs at the top of the group.          | Is beyond the group.                                       | Is in own group.   |  |
| Responds with interest and opinions.       | Exhibits feelings and opinions from multiple perspectives. | Shares bizarre, sometimes conflicting opinions.              |  |
| Learns with ease.                          | Already knows.   | Questions: What if   |  |
| Needs 6 to 8 repetitions to master.        | Needs 1 to 3 repetitions to master.                        | Questions the need for mastery.                              |  |
| Comprehends at a high level.               | Comprehends in-depth, complex ideas.                       | Overflows with ideasmany of which will never be developed.   |  |
| Enjoys the company of age peers.           | Prefers the company of intellectual peers.                 | Prefers the company of creative peers but often works alone. |  |
| Understands complex, abstract humor.       | Creates complex, abstract humor.                           | Relishes wild, off-the-wall humor.                           |  |
| Grasps the meaning.                        | Infers and connects concepts.                              | Makes mental leaps: Aha!                                     |  |
| Completes assignments on time.             | Initiates projects and extensions of assignments.          | Initiates more projects that will ever be completed.         |  |
| Is receptive.                              | Is intense.  | Is independent and unconventional.                           |  |
| Is accurate and complete.                  | Is original and continually developing.                    | Is original and continually developing.                      |  |
| Enjoys school often.                       | Enjoys self-directed learning.                             | Enjoys creating.   |  |
| Absorbs information.                       | Manipulates information.                                   | Improvises.  |  |
| Is a technician with expertise in a field. | Is an expert who abstracts beyond the field.               | ls an inventor and idea<br>generator.                        |  |
| Memorizes well.                            | Guesses and infers well.                                   | Creates and brainstorms well.                                |  |
| Is highly alert and observant.             | Anticipates and relates observations.                      | Is intuitive.  |  |
| Is pleased with own learning.              | Is self-critical.  | Is never finished with possibilities.                        |  |

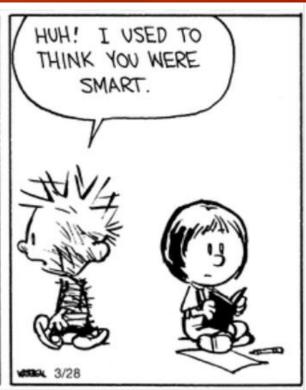
[8]

#### Drive to learn and understand









## Reliable identifiers

- Parents
- Peers
- Self
- Checklists [10]
- Psychometric assessment tests [9]

Teachers

#### Different needs

• Little in common with age peers



#### Self-ID

- Student self-assessment (brilliant behaviour checklist)
- Teachers are encouraged to provide this checklist to students who are self-advocating for more challenging learning experiences.
   Students who have been identified by parents and/or teachers may also be given the opportunity to complete this checklist.
  - From Stanmore Public School, Inner-West Sydney

### Incidence

- Some will claim that they have never seen a gifted child [12]
- Yet...
  - Mildly gifted: 116-130
  - Moderately gifted: 131-145
  - Highly gifted: 146-160
  - Profoundly gifted: 160
- Maybe masked by...
  - Dumbing down
  - Not above-level tested
  - Under-achievement
  - Misbehaviour or day-dreaming boredom
  - Asynchrony
  - 2e [16]
  - Hyersensitivity

$$= \sim 10\% = +1 \text{sd}$$
  
=  $6.8\% = +2 \text{sd}$   
=  $1.1\% = +3 \text{sd}$   
=  $top 0.0001\% = +4 \text{sd}$ 

### No standard

- Asynchrony
- Checked-out
- Misbehaviour
- 2e



"GIFTED CLASS, INDEED! ONE IS GIFTED IN

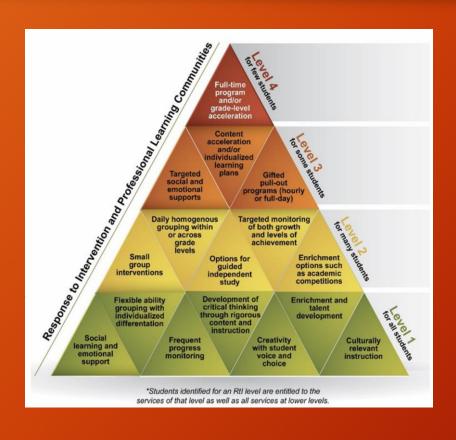
## Accommodations required

- pre-assessment and ongoing formative assessment are critical to ensure that learning area content and adjustments align with student needs
- gifted and talented students' accommodations:
  - should be encouraged to achieve educational standards beyond those of their peers
  - may require different levels of adjustment over time to reach their potential
  - may have the capacity to learn at a faster rate than other students
  - may require adjustments to different aspects of their learning [6]
- ACv9 "gifted program" in search shows 483 results only for curriculum connections and elaborations (+work samples and teacher background)
- [14,20]

#### Accommodations 'available'

- Curriculum compacting organized common sense [20]
- Telescoping e.g. 3-year program done in 2
- Subject acceleration
- Year acceleration
- Radical acceleration
- [14,19]

# Some guidance



### Stanmore Public School teacher responsibilities

- Use accessment and data to identify the specific learning needs of high potential and gifted students across all domains of potential.
- Apply evidence-based approaches that extend and challenge high potential and gifted students beyond their current level of mastery
- experiences that meet the advanced learning needs of students.
- Participate in school provided professional learning that enhances their expertise in planning and programming effective learning experiences for high potential and gifted students
- Collaborate with families, other schools and the wider community to support the learning and wellbeing of high potential and gifted students
- Communicate assessment and identification information to support the transitions of high potential and gifted students

## SPS provisions for gifted

- "challenge their capabilities and enrich (their) daily experience of schooling through a variety of strategies at a whole school, classroom and extra-curricular program level".
  - a school-funded enrichment programs teacher,
  - #differentiated learning programs which support the needs of HPG students—a strong focus across the school on promoting creative and critical thinking and rich and open-ended tasks
  - may form one or more classes\* which are aimed at providing a specialised learning environment that enhances and broadens the curriculum and caters to the specific learning and wellbeing needs of identified HPG students
  - For highly diffed students, curriculum compacting, mentoring and acceleration may be implemented
  - [11]

## QLD examples?

- https://kurwongbahss.eq.edu.au/SupportAndResources/FormsAnd Documents/Documents/Curriculum/kss-enrichment-andextension.pdf#search=gifted - last 6 pages
- Yet, EdQ website under gifted just has generalized statement\* and a reference to QLD Academies that needs updating
- Some private schools offer IB (PYP, MYP, IB) and external programs
  - <a href="https://education.qld.gov.au/parents-and-carers/school-information/life-at-school/gifted-and-talented-education">https://education.qld.gov.au/parents-and-carers/school-information/life-at-school/gifted-and-talented-education</a>

## It's not easy

#### To parent

- Relentless thirst for knowledge and challenge - next slides
- Voracious reader
- Not necessarily needing a lot of sleep
- Can be a lonely ride

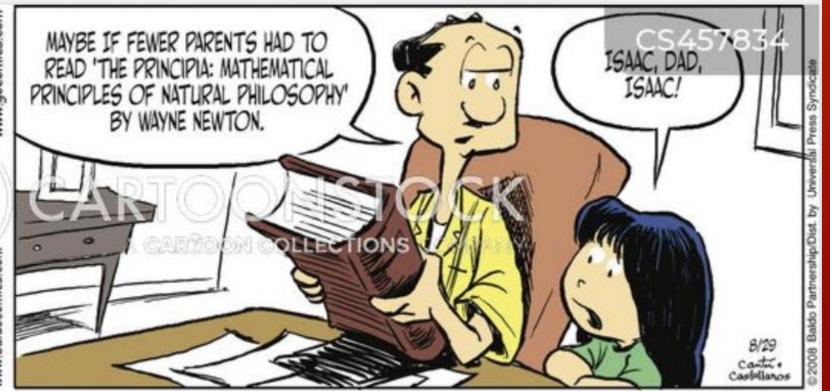
#### Nor to teach

- Finishes work quickly
- Can't engage if too far below level
- Group-work challenges
- Sourcing appropriate materials
- Can be a lot of work



## Exhausting







## **Gifted and talented**

[15]

2-5%

of gifted students have a learning disability Gifted students do not always excel at school



Adjustments should comprise elements of any or all of the following:



faster pace (acceleration, compacting)



greater breadth (enrichment)



more depth (extension)



Giftedness does not guarantee a student's future success

Many gifted and talented students are perfectionists and will work on a task until it is completed to their satisfaction



Giftedness may be physical, intellectual, creative, social or perceptual



Up to 10%

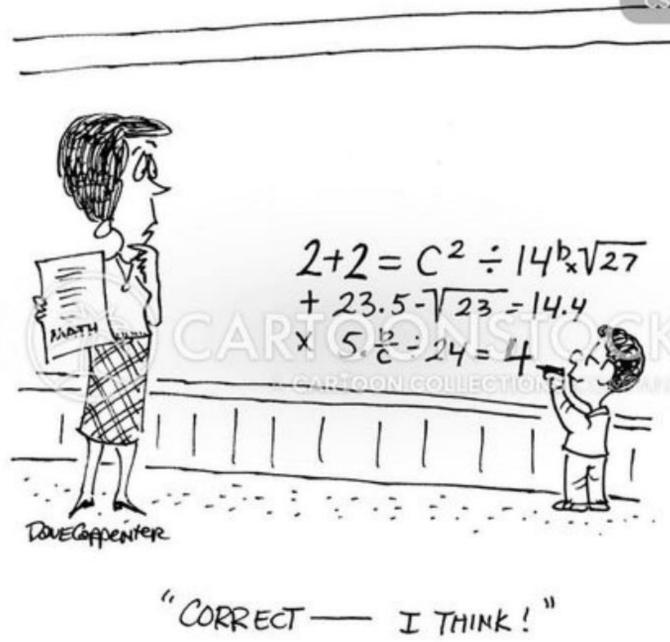
of students in a class are gifted and talented



The skills and abilities of gifted children may develop at different rates across the social and academic domains

### Out of your depth

 Unfair to expect teachers to cater for highly and profoundly gifted students



#### If we don't make accommodations

- Oz school performance dropping in last 20 years (PISA TIMSS) [18]
- Stagnate, disengage, become disruptive (or shrink away)
- Many gifted students move overseas for professional opportunities deemed not available in Oz [17]

## Take home for parents

- Testing for peace of mind
- Support from organisations (QAGTC)
- You know your child best (with evidence)

#### Take home for teachers

- Pre-test
- Be flexible with programming
- Enrol in competitions
- Allow intellectual peer pairings
- Raise the bar
  - Vygotsky's ZPD
- Cast the net wide



## Support

- https://www.qagtc.org.au/resources/support-iq-testing-families
- students can require support to manage their self-perceptions, confidence and motivation or self-efficacy, their attitudes towards teachers and school, as well as their anxiety, emotional engagement and goal orientations
- Teachers also need guidance in identifying ways to enrich or extend the curriculum and learning opportunities to execute sometimes considerable curriculum adjustments
- [14,18]

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