How should gifted and talented children be identified? Compare two different education systems and make your own recommendations.

Introduction

Countries around the world are seeing investment in education as key to global competition. How they tailor and prioritise this investment reflects national priorities and beliefs. This is particularly evident in provision for gifted and talented children in terms of how broadly gifts and talents are defined and assessed. This assignment compares two contrasting systems – Singapore and Finland – to show how identification of gifted and talented children can be markedly different even in two countries of comparable size, wealth, and academic performance. This supports recommendations tailored to different priorities and contextual factors which may underpin identification strategies. The next two sub-sections give a brief overview of each system, with the following discussion then making comparisons.

Singapore overview

Singapore is a densely-populated, multi-cultural city-state in South-East Asia with a population around 6 million and a "highly developed and successful free-market economy" (CIA, 2018a). Its GDP puts Singapore among the strongest Western European countries, in part attributed a strong work ethic and education being a strong national and cultural priority (Neihart & Teo, 2013). Singapore's academic performance on Programme for International Student Assessment (PISA) and Trends in International Mathematics and Science Study (TIMSS) consistently puts it among the top 5 countries in the world (Neihart & Teo, 2013).

The first "screening for giftedness" is at the end of grade 3 where all students take locallydesigned national exams, with the top 1% going forward to the Gifted Education Programme (Neihart and Teo, 2013, p.291). Exams are in two stages: screening and then selection. All children take the first exam in English language and mathematics in August, with the top scoring 8% of students invited to take another test in English language, mathematics and general ability in October (Singapore MOE, 2018b). This results in around 500 students each year attending the Gifted Education Programme in a choice of 9 primary schools, each of which offers the same programme of curriculum enrichment (Singapore MOE, 2018b).

Students who do not progress to the Gifted Education Programme at the end of grade 3 have another opportunity for selection based on their performance in the Primary School Leaving Examination (PSLE). While PSLE exam scores will not let students enter the gifted programme, they can be streamed into Express, Normal (academic) or Normal (technical) courses (Singapore MOE, 2018c). Any parent may also choose to enter children for individual exams with a registered psychologist who uses IQ tests to screen for Exceptionally Gifted Children, although this is a rare distinction at around 3 children per 100,000 (Singapore MOE, 2018a).

Finland overview

Finland is in Northern Europe with a population over 5.5 million, the majority of whom are concentrated in the south (CIA, 2018b). As well as having a similar population to Singapore, its post-war "diversified modern industrial economy" has likewise resulted in one of the highest per-capita incomes in the world and education is similarly prioritised by the government (CIA, 2018b). However, there is a much stronger social justice agenda which is evident in more egalitarian policies, as discussed in the next section. This means that all schools are regarded as very high quality and able to meet the needs of all pupils, so there is

very little emphasis on selection of gifted and talented students in Finland and most pupils simply attend their nearest school (Mönks, Pflüger, & Nijmegen, 2005).

This impacts on identification of gifted and talented children since it is assumed "no significant differences exist in teaching quality between public and special schools [for the gifted]" (Tirri & Kuusisto, 2013, pp. 84–5). Consequently, selection of gifted children is a low priority because differentiation is thought to be make education suitable for all students so there is little risk of wasting talent by not identifying gifts and talents sooner. Finland's PISA performance adds weight to this claim of effectiveness, with scores consistently in the top 3 countries worldwide and Finland ranking as the highest-achieving country in Europe (Tirri & Kuusisto, 2013).

Comparisons

Prioritisation of education is comparable in Singapore and Finland, although financial investment is markedly higher in Finland at around twice the rate of GDP (The World Bank, 2018). Finland's substantial investment is argued to reflect education having a social justice goal in which education is seen "as a means of looking after its weakest members" (Tirri & Kuusisto, 2013, p. 86). The most obvious difference this makes is that gifted and talented children in Finland stay in the same classrooms as their peers and often work together, while Singapore makes special provision which takes gifted and talented children out of mainstream classrooms.

The point at which children are assessed is similarly differing, with Finland putting the onus on class teachers to identify and support gifts and talents in a holistic sense. Finland's teachers are among the most rigorously trained and highly qualified in the world, with the majority holding masters degrees (Sahlberg, 2010). Teachers also broadly subscribe to

egalitarian and social justice values, holding growth mindsets (Laine, Kuusisto, & Tirri, 2016) in which all children have the potential to become gifted and talented. Thus, identification is qualitative and ongoing, with differentiation being effectively used to nurture and challenge such that "the Finnish educational system is highly developed with regard to gifted education, even though it is not referred to in such terms" (Tirri & Kuusisto, 2013, p. 88).

Singapore starts from a similarly egalitarian valuing of each pupil as equal, but also pushing every child to work hard, a combination which has been described as "not as Chinese as China or as Western as England" and aligning with an incremental view of ability in which anything is possible with hard work and persistence (Neihart and Teo, 2013, p.291). This means that children are given some time and space to find their "hidden gifts", showing how it is important to give all pupils the right environment to develop their gifts and talents (Neihart and Teo, 2013, p.291). However, it is this "moral obligation" to uncover and make the most of such gifts (Neihart and Teo, 2013, p.291) that makes Singapore's identification more intense than Finland's. There may also be an influence from history since Singapore's economic development was centred around meritocracy to challenge the dominance of the ruling Chinese elite (Győri, 2011). Finding the top 1% or 5% is therefore paramount for maintaining a positive elite, making Singapore "a talent-friendly society" (Győri, 2011, p.147). However, this is only partly true since the system only really rewards those talents deemed important for Singapore's development, currently science and technology (Caleon & Subramaniam, 2008), contrasting against Finland's emphasis on development of individual gifts being more about developing an individual rather than seeking out desirable gifts and talents.

Nevertheless, Finland at least recognises some national priorities at the very extremes of exceptional talent. Joint funding from Nokia and the Finnish government offers boarding school places to 20 pupils whose education is accelerated so that they complete school a year early (Tirri and Kuusisto, 2013). These 20 students are selected based on scores in "excursion weekend tests" (Tirri and Kuusisto, 2013, 90), making these the only selective tests in Finland. It can therefore be seen that Finland has strong values of equality for the vast majority of students using teacher judgement, but also uses exam-based selection to identify the most elite students in much the same way as Singapore makes special provision for the most exceptional 3 children per 100,000 (Singapore MOE, 2018a).

It is also noteworthy that Finland is starting to use acceleration, either by condensing the curriculum or through grade-skipping, where previously the system relied on differentiation within the classroom (Tirri & Kuusisto, 2013). This is an important acknowledgement that identifying gifts and talents does not just mean identifying high ability but also specific learning needs, such as needing more challenge or to learn at a faster pace. For instance, Davis, Rimm, and Siegle (2011) argue that acceleration is not really about gifted and talented students going faster but rather teachers moving at the pace which those students find comfortable. Similarly, while curriculum enrichment is valuable for the majority of students as part of effective differentiation, there are also argued to be other types of enrichment which "seem appropriate strictly for gifted and talented students" (Davis, Rimm, & Siegle, 2011, p.146).

Nevertheless, there is still an egalitarian rationale for acceleration as students can be accelerated based on being identified as suitable by their teacher. Students can therefore accelerate when they are ready and, since acceleration is personalised, find their own comfortable pace. The Singapore system of enrichment and acceleration has much stricter cut-offs by which a child must be identified as gifted or talented – indeed, there is really just one opportunity to join the main gifted programme (Neihart & Teo, 2013). There is also little provision for ongoing assessment in Singapore, such as deciding whether the gifted programme remains effective for learners, making identification of gifted and talented children much more summative while Finland can be thought of as more formative.

Recommendations

International comparison test show Singapore and Finland are both highly successful not just as creating a positive elite of world-leading students but also at raising attainment across all levels of performance. Gifts and talents are effectively nurtured in both systems regardless of whether a child meets formal identification as gifted and talented. It is therefore not appropriate to say that one country's system of identification is better than the other. However, it can be seen that Finland's system is more flexible in identifying and supporting a broader range of gifts and talents throughout a student's entire academic career. In contrast, Singapore identifies a narrower range of gifts and talents which it wants to prioritise with special enrichment opportunities. That Finland has made some moves in the same direction shows that there may be consensus on this type of identification for those very exceptional students: both countries base such judgements on a combination of qualitative expert assessment and exceptional examination performance, with students able to submit for identification at any age.

The identification system for the vast majority of gifted and talented students does not have this same consensus, and it is arguable that such systems must be consistent within national priorities and social values. A good identification regime is also aware of what provision is available (Davis et al., 2011), so it is not enough just to find the top 10% but rather to find those students most suitable for the talent development programme which follows the assessment. In this respect, the identification systems in both countries are ideally suited to their respective situations. As a final recommendation, the countries in this study were chosen for their contrast of a qualitative system in Finland and a quantitative system in Singapore, so it seems that a combined approach could enhance both systems as Singapore could add flexibility to consider a broader range of gifts and rates of student development, while Finland could add some objectivity to teacher judgement.

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