This paper presents three case studies of gifted children with a disability. Emphasis is on the importance of identifying the gifted abilities of such individuals and providing for their special needs. Sarah is a 14-year-old girl with severe athetoid cerebral palsy who has above average mathematical ability and general knowledge. The use of computers and other aids as well as efforts to meet her individual needs have allowed her to be fully included in her secondary school. Melanie is a gifted secondary student with attention deficit hyperactivity disorder whose impulsive behaviors interfered with meeting her educational needs. Application of Gossen's restitution model helped her learn to take responsibility for her behavior and resulted in improved academic achievement. Adam, a young child with autistic tendencies but high ability in written language and number concepts has been integrated into a regular primary class. Factors contributing to successful inclusion of these children are identified, including a broadly based identification procedure, acknowledgment of individual learning styles and needs, collaboration, an informed approach, appropriate curriculum, parent advocacy, and a philosophy of acceptance. (Contains 11 references.)

(DB)
Inclusion for Children with Dual Exceptionalities

Paper presented at the
Annual Convention of
The Council for Exceptional Children
Minneapolis, MN
April 15 - 19, 1998
by
Deslea Konza
University of Wollongong
Northfields Ave
Wollongong 2522
New South Wales
Australia
Inclusion for Students with Dual Exceptionalities

Deslea Konza

University of Wollongong

Difficulties associated with the identification of gifted children are now well documented (Whitmore, 1980; Elkind, 1987; Shore, Cornell, Robinson & Ward, 1991; Vialle and Konza, 1997). We are aware of the dangers of relying on a single criterion to identify giftedness, and of the need to use multiple measures and ongoing assessment to obtain more ecologically valid information on which to base our decisions. We now also know that there is no single, easily identifiable portrait of a gifted child. The fact remains, however, that many individuals with unrealized potential continue to lead frustrating and unfulfilled lives because their gifts have not been recognised. This paper will focus particularly on those individuals who are at great risk of non-identification, because their gifts or potential strengths are accompanied by a disability of some kind. We will examine the experiences of three individuals who live with very complex combinations of strength and disability. We will also examine some of the implications of the stories these individuals have to tell, in terms of the responsibilities parents, teachers and the wider community have to assist them in their development.

Many gifted children live with what is called ‘asynchronicity’, that is, an uneven development in different areas. Thus, (using some of the categories within Gardner’s [1983] conceptualization of giftedness) they may have enormous strengths in the logical-mathematical domain, but have only average ability in other areas; they may have outstanding visual-spatial abilities, such as those demonstrated by the great artists, but be unable to relate to others within their social sphere; they may have the bodily-kinaesthetic ability of a Pavlov or a Nureyev, but have only average linguistic and mathematical abilities. Moreover, any combination of strengths and weaknesses is possible, making the issue even more complex.
It is when a gift is accompanied by a disability of such significance that the disability attracts great attention, that the problems of the identification of a gifted individual becomes even more problematic. We will now focus on the stories that Sarah, Adam and Melanie have to tell. These three individuals have great strengths, but they also have special needs which demand great attention, and which could so easily have blinded those around them to their underlying gifts.

SARAH - a gifted student with cerebral palsy
Sarah is a 14 year old girl with severe athetoid cerebral palsy. Shortly after her birth, when the extent of her physical disabilities was apparent, her parents were told she would never walk or talk, that her life experiences would be extremely limited, and that she would be profoundly intellectually disabled. Sarah’s parents were told of the range of excellent special schools that catered for children like Sarah and that they would be put in touch with specialist services to help Sarah and to assist them in adjusting to life with a severely disabled child.

Fourteen years later, much of what those first doctors told Sarah’s parents has been proved correct. Sarah is unable to walk, and is almost completely non-verbal (only family, her Integration Aide and a couple of friends can understand more than her yes and no). She is highly dependent on other people to attend to her physical needs and will never be able to live independently.

She is, however, much more than this list of what she is unable to do, would suggest. With the use of a chin switch on an electric wheelchair, Sarah is independently mobile. She uses a headpointer with an IBM compatible laptop computer. With the addition of Easy Keys software, a speech output word predictor, Sarah is relatively independent in written communication. Academically, it has emerged that Sarah operates in the above average range in the mathematical area although her reading and written language are
somewhat delayed and spelling is poor. Her general knowledge also reflects her above average ability. Socially, Sarah is extremely adept for someone who has such enormous difficulties communicating.

Fortunately, Sarah’s parents were never convinced by early appraisals of their daughter’s potential. Persistent requests for further assessment of their daughter finally led to an assessment which recognised her strengths as well as her areas of need. This took some years. Computer technology finally offered the solution, as it was through the use of a computer, that Sarah was finally able to communicate and so demonstrate her high levels of ability in the mathematical area.

With the assistance of a full time Integration Aide, Sarah was fully integrated throughout the primary years into her local school, a school which had all the facilities necessary for a severely physically disabled student.

Sarah’s transition to secondary school was not without its difficulties. Historically, secondary schools have posed greater difficulties for students with high support needs. Her transition to secondary school was a complex process, involving the following:
• early planning to ensure that the school was accessible for a student in an electric wheelchair;
• dissemination of information about Sarah, her abilities and her disabilities;
• staff development prior to her enrollment, and on a continuing basis;
• high levels of collaboration with regular teachers, special educators, teacher’s aides, counsellors, physiotherapist and occupational therapists;
• provision of a range of highly specialised physical resources; and
• peer education.
Sarah is now settled into Year 8 and is integrated for most of the school day. Discussions with teachers reveal that Sarah is making good progress, particularly in mathematics. Liaison with a teacher with expertise in the education of gifted children is enabling Sarah and some peers who show particular talents in the area of mathematics to follow an extended program. Language continues to be the area of greatest need, but Sarah's level of achievement is comparable with many of her peers.

There have been other positive outcomes resulting from efforts to meet Sarah's individual needs. The Special Education teacher has had the opportunity to share her expertise and also to develop further mainstream classroom skills. Sarah's regular teachers have broadened the base of their expertise, overcome misconceptions about the range of abilities people with disabilities may have, and developed new insights into how special abilities may be expressed. Sarah's inclusion in the secondary school has also broadened the perspective of other regular students at the school. But Sarah's story could have had a very different outcome!

MELANIE - a gifted student with attention deficit hyperactivity disorder

While no formal assessments were conducted, Melanie's teachers and parents agreed that she was a child of great ability. She was reading before she entered school, rapidly grasped new maths concepts, and had an exceptional memory. She was an entertaining mimic and could pick up new accents with ease. She also, however, became bored very easily and expressed her displeasure in unacceptable ways, regularly indulged in tantrum behaviour even at the ages of nine and ten, was highly intolerant of those who couldn't grasp concepts quickly, was highly oppositional in her behaviour and rejected all attempts to modify her behaviour.

Melanie demonstrated the three significant features of attention deficit hyperactivity disorder - attention difficulties, impulsivity and hyperactivity (as defined by Barkley, 1990; Carroll,

D. Konza
Inclusion for Students with Dual Exceptionalities
1993; Lerner & Lerner, 1995; Rooney, 1995; Schacher, 1991 among others). She also demonstrated other common, but not universal features of attention deficit disorders such as inflexibility, poor motivation and task persistence on tasks that were not immediately satisfying for her, low self esteem and oppositional behaviour.

Medical and physical examinations were carried out to rule out allergies, etc. The usual management methods, such as the setting of clear limits, the use of natural and logical consequences, the systematic use of social, activity and token reinforcers, and the use of contracting were used at various times. All had limited effects for short periods of time. As she was a very bright and articulate child, it was possible to involve Melanie from quite an early age in discussions about her behaviour, and in the joint planning of reinforcers, decisions about contracts, etc, yet her immediate responses in most situations were so impulsive, extreme and often dangerous, that the most carefully thought out plans and contracts had little effect. The application of consequences had some short term effect, but there was concern as she grew older that no sense of personal or social responsibility, and no mechanisms of self control were being developed. There also appeared to be some loss of self esteem and sense of personal worth as Melanie realised that her behaviour was affecting family and social relationships.

By early secondary school, truancy, and increasingly hostile responses to any authority were common features of Melanie's behaviour. Melanie's teachers were joining her parents in despair over her underachievement and apparent determination to reject assistance or guidance, but all were equally determined not to 'give up' on attempts to help Melanie adjust her behaviour and achieve her potential. Gossen's restitution model was the result of a search for other management models that may have something to offer Melanie.
Gossen's Restitution Model

Diane Gossen acknowledges the contribution of William Glasser in the development of her model. Gossen rejects the notions that the external application of consequences, either positive or negative, will bring about internal change; that an individual can force another person to do something he or she doesn't want to do; that positive reinforcement is beneficial; that guilt and criticism build character; and that adults have the right to coerce children.

'Restitution is a Reality Therapy-based technique for helping people become self-directed, self-disciplined and self-healed. The emphasis...is not on behaving to please other people or to avoid unpleasant consequences. The emphasis is on becoming the person one wants to be....Restitution allows the person to heal himself by becoming the person he wants to be (Gossen, 1996: 43). 'The restitution approach assists people in making an internal evaluation of what they can do to repair their mistakes' (Gossen, 1996: xiv). The focus is on 'making things right'.

The aim of restitution is to allow the person who has wronged to remedy that wrong and so become stronger. There is an acknowledgement that mistakes are a part of life - everyone makes them. The important question asked after some wrongdoing is 'What is your plan to fix it?' It is the responsibility of the wrongdoer to come up with a solution that will make some amends for the wrong done. In doing this, reparation is made and the perpetrator learns new skills and so becomes stronger. Guidelines for the solution are as follows:

- It has to take time and effort on the wrongdoer's part
- The 'victim' has to be satisfied with the result
- It should be in the same general area as the mistake
- It should make the wrongdoer stronger
These notions were discussed with Melanie over a period of several months at the beginning of Year 9 when she was 14 years old. Both teachers and parents were involved in the discussions, however, the first few times they were tried in practice, Melanie refused to co-operate.

A breakthrough occurred late in Term 1 after Melanie had truanted from school with two friends, stayed away from home overnight without her parents' permission, and forged her father's signature on an absence note to the school. This escapade involved putting the mother of one of her friends in a very awkward position, lying to her parents and causing them great anxiety when they did not know where she was; causing great anguish to her sister when trying to involve her in the plot and causing great disappointment to her teachers.

After the initial furore was over and Melanie was safely back at home, there was a long and protracted discussion about how reparation could be made to the various people who had been hurt in this incident. It was put to Melanie that she needed to come up with some restitution that would repair the damage and make her feel more like the person she wanted to be. It was explained that she was quite capable of coming up with a solution that would make her feel better about herself and help repair the damage she had caused.

For the first time, Melanie did not immediately reject the notion. After some considerable time, Melanie eventually came up with the following solutions:

- she would write a letter of apology to the friend's mother
- she would write a letter of apology to her teachers
- she would ground herself for a month to remind herself how much she valued her freedom
- she would draw up a contract with her parents in which she would undertake to always let them know where she was
• she would relinquish her pocket money for a fortnight to contribute towards the cost of petrol used in searching for her
• she would do her sister's chores for a week

The critical aspect of this list is that Melanie developed it herself. It went through several drafts, and there were repeated discussions about whether or not her reparations met the criteria of 'good restitution'. Her family accepted the list and she received an understanding response from her teachers and her friend's mother. Melanie expressed some satisfaction that she had determined the solution herself.

The success of the model was repeated several times from that point on, both at home and at school, with some success. Melanie has abided by her self determined reparations, and difficult behaviours have reduced in frequency. Academic grades showed an almost immediate improvement and continued throughout the year. There is still close communication between the school and home and she receives regular feedback about how well she is progressing. Life is not always peaceful in Melanie's household - as her father expresses it, 'There are always waves on the ocean of Melanie's life, but we now have fewer storms at sea'.

ADAM - a gifted child with autistic tendencies
Adam's uneven developmental profile throughout infancy and toddler hood foreshadowed the perplexing and enigmatic child he has become. Physical milestones were those of a typical child, however, his emotional development was clearly delayed. He did not form the normal close attachments to his mother, other family members, or with 'significant others'. He was highly dependent on routines, vigorously resisted change and indulged in a range of obsessive behaviors. He demonstrated an early interest in number and written language but his oral language did not progress past a babbling stage.
Adam's impaired social and communication skills resulted in his referral to a child psychologist at three years of age. He was initially assessed (using the Stanford Binet) as being in the average to low average range of ability, and as having 'autistic tendencies'. While acknowledging that Adam clearly had special needs, his parents were also aware that he had some exceptional abilities, none of which had been detected or commented upon in his 'assessment'.

They were determined that he would have as normal an education and environment as their other two children, and so placement in the local preschool followed by enrollment at a regular community school was planned. Adam became a familiar and accepted figure within his comparatively small community and he gradually became accustomed to the school he was to attend because of his older brother's attendance there.

Adam's enrollment at the preschool from the age of four was relatively uneventful, although it was clear that he embodied a unique combination of strengths and weaknesses. He quickly focused on the computer and managed computer games that would challenge a child several years older. He did not, however, interact at all with the other children, continued to resist efforts to involve him in any social activity and had great difficulty adapting to any change in routine. He also began speaking in a robotic 'Nintendo-like' voice which was still largely incomprehensible to most people.

The principal of the school at which he was to enroll, had the opportunity to observe Adam in the preschool setting, and had also become familiar with him through various Kindergarten orientation activities conducted late in the year prior to his enrolment. She was concerned about his poor language and social skills, and his lack of flexibility, but recognized that he also had strengths. The teachers at the school had a strong commitment to the philosophy of inclusion and were already meeting the needs of children with a diverse range of abilities and disabilities. Nevertheless, it was with some sense of
trepidation that the teachers at the small community school welcomed Adam into Kindergarten for his first year of formal education.

The class teacher refers to the early weeks of kindergarten as ‘a blur’, as Adam and the other kindergarten children adapted to the routines of ‘big school’. Adam initially found the transition from one activity to another difficult, even when prepared as much as possible, however as the routines became established, Adam settled down and, within a few weeks, managed this aspect of school very well.

Adam did not respond effectively to verbal instructions, particularly those given to the group, rather than to him as an individual. When the teacher included many more visual cues in her instructions, Adam was able to respond much more positively.

Although Adam was confidently reading aloud to his mother before he started school, he was unable to do this with his teacher at school. Adam’s teacher was prepared to wait for him to develop the necessary trust in her, and within six months, Adam had the confidence to read aloud to her. Thus many of Adam’s early difficulties were overcome with patience and with small modifications to teaching style.

Adam has now concluded his first year at school. His oral language has developed to the point where he is generally understood by most people. His written language achievements are equivalent to those of a child one to two years older and his number concepts are even more advanced.

There are, however, continuing challenges. It takes considerable time for Adam to feel confident with new experiences. He avoids tasks that he finds difficult because he constantly strives for perfection and that rarely happens on a first attempt! This reluctance to try new activities means that it is difficult to extend him. His asocial behaviour also
means that accelerating him would be problematic. He continues to have difficulty accepting correction or redirection, saying 'No! no!' repeatedly, babbling to himself and withdrawing from any social contact on those occasions when he is corrected. He has not yet established any friendships and continues to avoid even superficial contact with others.

At the conclusion of his first year at school, the teachers reflected that, while it had not been without difficulties, Adam’s introduction to the school had been successful. Although Adam is still at the beginning of his formal education, his early experiences reveal that a child with such a range of needs and abilities can be catered for in a regular classroom, if surrounded by people with the appropriate skills and more importantly, a willingness to meet individual needs, whatever they may be.

**Contributing Factors to Successful Inclusion**

Analysis of the stories that Sarah, Melanie and Adam have to tell us, reveals a number of factors which were significant in meeting all their needs, and which have some important implications for teachers of such students.

- **Broadly based identification procedures**

  It is critical that identification procedures beyond those traditionally used to identify gifted children be used if gifted students with disabilities are to be recognised. There is a danger that once a single label, such as cerebral palsy or Attention Deficit Hyperactivity Disorder, is applied, other factors which may affect behaviour, performance or potential, may not be considered. In Sarah’s case, the notion of her giftedness may not have been considered due to her extreme communication difficulties. In Melanie’s case, the similarity of many of the characteristics of ADHD and giftedness may have clouded the realisation that she, in fact, qualified in both areas. Adam’s parents were unimpressed with both the management and the outcome of his early assessments, taking place as they did in totally unfamiliar settings.
with unfamiliar people. These are totally inappropriate procedures with any child, but even more so for a child with Adam's sensitivities.

Conventional intelligence tests did not pick up Adam's gifts and certainly would not have identified Sarah's. Information needs to be gathered from a range of sources and in a range of environments if the needs and the potential of gifted students with disabilities are to be recognised.

- An acknowledgment of individual learning styles and needs

Adam's class teacher noted early in the year that Adam was a 'visual child' and was able to adapt her instructional style to match his needs. The use of less auditory input and more visual cues meant that instruction and directions were more accessible for Adam, thus reducing his frustration and increasing his ability to cope in the regular classroom.

The use of Gossen's restitution model was very effective with Melanie. It utilises strategies which are relevant and important to most gifted students. It requires them to develop creative solutions to problems, which is usually an attractive option for bright young people, and in the process it skills and strengthens them.

While most gifted students thrive in an environment where they are free to pursue individual projects in their own way and in their own time, the added complications of attention problems may mean that these students require closer monitoring than most if they are to remain on task. Even after Melanie's behaviour was modified to some extent, the close co-operation between home and school and regular monitoring of her behaviour was still necessary for her to remain focused and working to her ability level.
The extensive use of computer technology in Sarah's case is the only way in which she can operate to her full potential and it is clear that without this highly adaptive and individualised technology, she could not operate in a regular school.

**Collaboration**

The successful inclusion of gifted students with disabilities requires the collaboration of many individuals with expertise in a range of areas. This was particularly true in Sarah's case, where parents, regular teachers, specialist teachers, specialist aides, physical therapists and others contributed to her successful inclusion in a regular school.

Collaboration between the home and school was also critical in Melanie's case, where both parents and teachers worked together over a period of many years to find an approach which would meet her diverse needs. Adam's parents were also influential in providing essential information for his teachers which greatly assisted the successful meeting of his needs.

**An informed approach**

The teachers involved in these successful stories of inclusion operated from a foundation of knowledge. Adam's teachers were able to gather important information concerning Adam from a range of sources.

* Previous assessments - these focused on his areas of strength and need (although admittedly emphasized the needs rather than the strengths).
* Adam's parents - Adam's early ability to read and his strong number concepts were raised by his parents, which enabled Adam's teacher to prepare for him more effectively.
* Preschool teachers - successful management strategies were passed on by the preschool teachers. One of the most helpful was the fact that it was important to prepare Adam before a preferred activity was to cease, and thus give him time to prepare for the change.
* Their own earlier experiences with him - Adam’s proficiency with computers, his facility with numbers, his written language ability and his difficulty with changes in routines were all noted during early contact with Adam, and this information helped the school to prepare for him.

The teachers involved with the three students mentioned in this paper were also familiar with the concept of multiple intelligences and endeavored to nurture each individual’s strength. This approach is ideal for children such as Sarah, Melanie and Adam, who have clear strengths in addition to obvious areas of need.

The staff at the schools involved with Sarah, Melanie and Adam are aware that children with disabilities can have particular gifts, that they can learn in regular classrooms and that they have a responsibility to nurture these gifts. The teachers in these schools have been involved in, and continue to be involved in, regular staff development in the area of giftedness, and in the areas of particular disabilities, so they are sensitive to the needs of these children. They join the parents of these children in being strong supporters and advocates for all children with special needs.

- **Appropriate curriculum**

  All bright students, whatever additional needs they may have, require motivating and challenging programs. Teachers need to scrutinise their programs carefully, be prepared to broaden their notions of what students are capable of learning and achieving, and give every encouragement to students who approach their learning in different or unusual ways.

- **Parent advocacy**

  In each of these successful stories of inclusion, there has been strong advocacy from the parents, which greatly contributed to the success of the programs. It does give cause for us to think, however, of gifted children whose parents do not have the understanding, the
physical or emotional resources to provide this advocacy, and of the role teachers could play in meeting the needs of their children.

• **A philosophy of acceptance**

Perhaps the most significant factor relating to the successful inclusion of all these students in regular settings appears to be that the teachers were willing to accept the students, and acknowledged their right to an education in their local schools. There was no time or energy spent debating *whether or not* students should be enrolled. The focus was on *how* best to meet their needs, even when the needs were quite significant.

**Conclusion**

If we can ensure that as many factors as possible are considered when assessing children with disabilities, if we can respond to each student's unique constellation of strengths and needs on an individual basis, and if we can provide stimulating, motivating and challenging programs, our task of guiding them towards fulfilment of their potential will that much easier and that much more rewarding for our students - and for us.

**References**


I. DOCUMENT IDENTIFICATION:

Title: Inclusion for Children with Dual Exceptionalities

Author(s): Konza, Deslea

Corporate Source:

Publication Date: April '98

II. REPRODUCTION RELEASE:

In order to disseminate as widely as possible timely and significant materials of interest to the educational community, documents announced in the monthly abstract journal of the ERIC system, Resources in Education (RIE), are usually made available to users in microfiche, reproduced paper copy, and electronic media, and sold through the ERIC Document Reproduction Service (EDRS). Credit is given to the source of each document, and, if reproduction release is granted, one of the following notices is affixed to the document.

If permission is granted to reproduce and disseminate the identified document, please CHECK ONE of the following three options and sign at the bottom of the page.

The sample sticker shown below will be affixed to all Level 1 documents

PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL HAS BEEN GRANTED BY

________________________________________

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

Level 1

Check here for Level 1 release, permitting reproduction and dissemination in microfiche or other ERIC archival media (e.g., electronic) and paper copy.

The sample sticker shown below will be affixed to all Level 2A documents

PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN MICROFICHE, AND IN ELECTRONIC MEDIA FOR ERIC COLLECTION SUBSCRIBERS ONLY, HAS BEEN GRANTED BY

________________________________________

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

Level 2A

Check here for Level 2A release, permitting reproduction and dissemination in microfiche and in electronic media for ERIC archival collection subscribers only.

The sample sticker shown below will be affixed to all Level 2B documents

PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN MICROFICHE ONLY HAS BEEN GRANTED BY

________________________________________

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

Level 2B

Check here for Level 2B release, permitting reproduction and dissemination in microfiche only.

Documents will be processed as indicated provided reproduction quality permits. If permission to reproduce is granted, but no box is checked, documents will be processed at Level 1.

I hereby grant to the Educational Resources Information Center (ERIC) nonexclusive permission to reproduce and disseminate this document as indicated above. Reproduction from the ERIC microfiche or electronic media by persons other than ERIC employees and its system contractors requires permission from the copyright holder. Exception is made for non-profit reproduction by libraries and other service agencies to satisfy information needs of educators in response to discrete inquiries.

Signature: Konza, Deslea

Organization/Address: Faculty of Education/University of Wollongong, Northfields Ave, Wollongong NSW Australia 2522

Printed Name/Position/Title: Konza, Deslea

Telephone: 61 2 42213603

E-mail Address: konza@f.edge.uow.edu.au

Date: 23 Jan 1999
III. DOCUMENT AVAILABILITY INFORMATION (FROM NON-ERIC SOURCE):

If permission to reproduce is not granted to ERIC, or if you wish ERIC to cite the availability of the document from another source, please provide the following information regarding the availability of the document. (ERIC will not announce a document unless it is publicly available, and a dependable source can be specified. Contributors should also be aware that ERIC selection criteria are significantly more stringent for documents that cannot be made available through EDRS.)

Publisher/Distributor: 

Address: 

Price: 

IV. REFERRAL OF ERIC TO COPYRIGHT/REPRODUCTION RIGHTS HOLDER:

If the right to grant this reproduction release is held by someone other than the addressee, please provide the appropriate name and address:

Name: 

Address: 

V. WHERE TO SEND THIS FORM:

Send this form to the following ERIC Clearinghouse:

However, if solicited by the ERIC Facility, or if making an unsolicited contribution to ERIC, return this form (and the document being contributed) to:

ERIC Processing and Reference Facility
1100 West Street, 2nd Floor
Laurel, Maryland 20707-3598

Telephone: 301-497-4080
Toll Free: 800-799-3742
FAX: 301-953-0263
e-mail: ericfac@inet.ed.gov
WWW: http://ericfac.piccard.csc.com

PREVIOUS VERSIONS OF THIS FORM ARE OBSOLETE.