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Recommendations For Implementing Symbolics: Ways of Knowing Through The Realms of Meaning

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ABSTRACT

***Symbolics* gives students the foundation needed to be successful. School administrators will benefit more by implementing the *symbolics* realms of meaning into their core curriculum. *Symbolics* lays a foundation for critical thinking skills which will help educators to address the most common question students ask while taking mathematics. "Why do we need to learn mathematics?" Educators can respond by telling them the purpose of mathematics is to teach them how to reason and make decisions.**

Introduction

The six realms of meaning have all the ingredients needed for the success of students. For years educators thought there was a deep secret to improving the student achievement level. This secret was published in *Ways of Knowing*

Through the Realms of Meaning: A Philosophy for Selecting the Curriculum for General Education (Kritsonis, 2007). This book should be used the way a preacher uses his bible as a reference guide for making solid decisions relative to the curriculum.

The purpose of this article is to discuss how to implement one of the realms of meaning as a decision making process to improve student achievement. Although there are many ways to create a curriculum, with curriculum mapping being one method, the idealized curriculum is a holistic curriculum (Kritsonis, 2002). Recommendations listed will give educators an advantage in developing a holistic curriculum. Four recommendations are written in the order that will be most beneficial to student achievement. Most importantly, parts of the recommendations are the mastery of each realm before including another realm. The focus of this article is on the sub-realms that need to be mastered within the *symbolics* realm of meaning.

Recommendations

The following recommendations will help school administrators to create a solid curriculum:

1. **Make sure every aspect of the *symbolics* realm is mastered by the fifth grade.**

The *symbolics* realm consists of three sub-realms: *ordinary language*, *mathematics*, and *non-discursive* symbolic forms. The foundation of education can be found in the *symbolics* realm. Studies have shown that students who do not master the foundations will have problems with the rest of their academics. For example, students who never master the fundamentals of arithmetic such as fractions, decimals and percentage struggle more when they get into true mathematics like Algebra.

2. **Help students to master *Ordinary Language*.**

The part of *ordinary language* we would suggest mastery is in reading. We need to teach our young students not only how to read but how to read between the lines so that later in life they can read between the "lies" of political messages (Morales, 2004). Students that are well read have a better vocabulary, better understanding, and an active imagination. We must always give students books that are relevant to them at the beginning of their reading years. Allowing students to read about people of their own culture will help them be more acceptable to other cultures. Most importantly, reading proficiency depends on expert teaching so that the reader learns to access print accurately and fluently. Research has shown that scientific evidence must become a fundamental part of teaching. Teachers can use scientific evidence about how reading develops, why many students have difficulties, and how we can prevent reading failures (Lyon, 2002; Moats, 1999; Shaywitz, 2003). Fifteen minutes

a day is a jump start to independent reading. Each successive year in school, students need to gain a greater proportion of new knowledge by reading (Biancarosa, 2005). Good reading skills will prepare students for another type of language called "mathematics".

3. Make sure students master the language of *Mathematics.*

Mathematics is a language. The reason most students do not do well in it is mostly because of their poor reading skills. Learning the language of mathematics is just like learning a language from another country, but easier. The real problem that needs to be addressed in educating mathematics is setting high expectations from the very beginning. Students of all levels and background must be challenged, starting at the earliest grades. There is a big achievement gap between the minority students and white students especially in mathematics. To improve the achievement of students in mathematics we must reform the curriculum for mathematics to be more of a coherent curriculum of important mathematics, articulated across grade levels. We must also use technology that influences the mathematics taught and enhances students' learning (NCTM, 2000). Teachers can give homework that would involve the whole family in an outing to Home Depot where they can get the square footage of their living room and also price carpeting. Students need relevance in their studies; more importantly they need to be shown how to apply all the mathematics they have learned.

4. Teach students how to express themselves.

In dealing with the *non-discursive* language, we want to address writing skills. Teaching students to write down their feelings at an early stage will help develop their *non-discursive* skill. Writing gives students a voice. "Voice is the key to helping our students develop into writers. We must give them opportunities to hear their own written voices and the written voices of others, their peers, their teachers, and the best authors." (Romano, 2004) The new model for writing is thus "To learn how to write, students actually have to write." We must make sure we have professional development for teachers in teaching writing. The article "The Power of Voice" begins with the author thanking heaven for bad 7^{th} grade scheduling; because there was no talking in study hall, the author became a good writer by creating stories to pass to her friend. Writing will allow students to tap into their imaginations and feelings so that they can become better adults in the future. We would like to see even more professional development for teachers so that they can implement writing into their lessons. This can be done in mathematics as well.

Concluding Remarks

In conclusion, the purpose of this article was to discuss how to implement the *symbolics* realm of meaning as a decision making process to improve student achievement. By implementing these four recommendations, administrators and curriculum developers will be on their way to laying a great foundation for success. The ideal curriculum is one in which the maximum coherence is achieved, and segmentation is minimized. To this end, the curriculum of general education may be planned so as to provide concurrent study in all six of the realms of meaning, subject to the logical conditions that each topic be introduced only after the prerequisites to its proper understanding have been mastered (Kritsonis, 2007).

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