

Many articles have been written about the benefits of the Kumon math program as it relates to helping with mathematics classes in school and with performance on standardized tests. While these are very important benefits of the Kumon math program, studying the high levels, especially above grade level, is the essence of the Kumon method. If a student works his/her way up to self-studying the Kumon calculus levels, the benefits he/she will reap are numerous.

When students begin the Kumon program (in any subject), they generally will show rapid improvement in focus, study skills, discipline, and self-confidence. Those skills will translate into students being able to tackle new concepts easily on their own. They also build up a solid foundation in the lower and intermediate levels of the Kumon program, preparing them for those challenging higher levels.

At this point, many people may still be wondering “Why should my child study higher level math?” There are many practical reasons for this, but first, let’s talk about the goals of the founder of the company, Mr. Toru Kumon. Mr. Kumon’s goal was not to develop mathematicians or scientists. His intention was to help students to excel in any area of study. It took Mr. Kumon’s son, Takeshi, three years in the program to reach calculus while still in elementary school. Mr. Kumon believed that it was possible for any student to reach calculus.

In addition to Mr. Kumon’s goals, here are some practical reasons for self-learning high level math (calculus) while in high school or earlier:

- Acquiring strong mathematical ability during school years leaves more options open in selecting a major in college and pursuing a career.
- Students will likely be able to take Advanced Placement math and math-related courses in high school, which give the opportunity to obtain college credits before entering college.
- In today’s technology-driven society, having strong math skills is invaluable in the job market.

From Accounting to Medicine to Engineering to Architecture, math is everywhere in most every field. Some examples of real-life problems that concern us today, which would require high-level math to solve, are as follows:

- Finding energy alternatives to petroleum and fossil fuels
- Discovering new medicines to help people live longer, and cure and prevent diseases
- Building structures to withstand devastating natural disasters, such as floods and earthquakes
- Predicting movement of stocks and other securities in the financial markets

As children grow up, they will face many problems and will have to make decisions which require analytical thinking. Through long-term Kumon study, students will become self-motivated, independent problem solvers. Daily problem solving practice with emphasis on speed and accuracy helps to boost confidence and improve study habits. As Mr. Kumon stated, “by discovering the potential of each individual and developing his or her ability to the maximum, we aim to foster sound and capable people to contribute to society.” Self-learning high level mathematics is a crucial element of this goal.