Differentiation Needs in the Classroom, by Leah Dagher

Sincerest thanks to Alexey Root and the USCF Scholastic Board for inviting me to speak at this memorable event. I say that it will be memorable, because it is a great memory to have been invited to the first Koltanowski Conference. I was at that time, newly appointed to teach scholastic chess full time at Briarmeadow Charter School. During that conference, I made a presentation which explored the links between chess-sense and scientific thinking.

That exercise was one in which we compared two seemingly unrelated objects and created parallel lists of similar and opposite characteristics. This exercise required analysis, which ultimately brought to the forefront the type of thinking processes that exist in chess studies. It also required common sense, which many of us often employ without realizing. In that short time, we had some thought-provoking insights and shared commentary.

My assigned topic today is to discuss differentiation. Let me start by asking two basic questions.

# 1. “What is differentiation?” To properly define “differentiation in an educational setting” we are required first to define teaching. Dictionary.com defines teaching as: “The act or profession of one who teaches.” My own definition of teaching would probably read more like this; “A constructive effort to impart understanding about a subject (or subjects) to another person. Ok, here is the second question:

#2. “Why do classrooms need differentiate?”

In many cases three main factors exist which lead education experts to request that teachers differentiate as a necessary means to achieve educational goals.

O The classroom is teacher-led.
The teacher selects the methods of learning which will be used.

Learning takes place in groups of varying sizes and ability.

Differentiation becomes a factor, because we all know that kids aren’t made from cookie-cutter molds. Cultural and environmental influences shape kids’ learning processes long before they come into the classroom, and they are often widely varied, and rooted in traditional and multi-cultural backgrounds.

Interpersonal skills are often undeveloped.

Heretofore, teachers have been trying to level the playing field in the classroom, thereby limiting or virtually ignoring the needs underachievers and gifted learners. Sadly, many of our schools have resorted to lowering overall standards in order to alleviate disparity among the classrooms and meet state mandates on skills tests and assessments.

This is where ‘differentiation’ is becoming a major player in the field of education.

Research shows differentiation to be most effective in classrooms which are center-based or structured around the student’s learning styles. Choosing activities which stimulate thinking in imaginative and creative ways are empowering to kids, especially when the environment is focused on learning.

In most schools, students are not equal in their ability to read, write, and absorb information. This is a fundamental difficulty with establishing curricular goals in schools. The inherent obstacles are often developmental, and simply need time. Students are categorically placed on an educational ladder which identifies them first by age and secondly by grade level.
Teacher’s often say, “I have learners at these different levels…. I need to differentiate! How should I go about that?” Fortunately, educational experts have presented teachers with many ways to differentiate in their classrooms. Instructional strategies abound for planning differentiation in the classroom.

My good news here today is that Chess and chess-related activities fit very nicely within the framework of most classrooms which would seek to differentiate. And, back to my earlier point, in a teacher-led classroom, it is up to that individual teacher to select chess as an option for developmental learning. Chess as a choice??! Whoever thought of that? Actually, this is a new idea. Chess has been a mandatory part of many European schools’ curricula. Here is the real question, “Which teachers would be qualified to include chess?” The teacher with chess knowledge to be sure! What about the teacher who has chess interest, but no real chess knowledge? What about the teacher who has chess knowledge, but lacks the tools to present chess to the classroom as a subject of study? These are just two examples of a need to ‘educate’ the educator. Teachers with no chess knowledge and have no interest in adding chess are out there as well, but comprise, (I believe) a smaller portion of the whole.

Providing fundamental chess knowledge to classroom teachers would, on one hand, enable scholastic chess to exist in places which it has heretofore been exempted as a subject of study and on the other hand, help teachers provide differentiated learning to students at the earliest developmental stages of critical thinking. It has been suggested that implementation of chess learning via computer programs is a model way of learning. Perhaps this is so. The teacher only has to manage the record-keeping, and kids log on to complete the exercise each day and take a quiz to record progress. It is simple and direct. You may have heard, “Here’s the perfect program!” and it may well be, … lacking only in the common shared human experience of being across the board from “your-BFF- turned-arch-enemy,…” or your GFF –trying to sabotage your Queen!- 😂LOL All kidding and jokes aside, most children’s lives today are so complex that they are now given their own growth charts to follow, asked to make their own progress reports and to ‘assess themselves’ along with ‘teacher’ check lists to complete. My own
children bring home on a weekly basis, parent consent forms for participation in extra-curricular school activities where parents used to be involved and virtually everyone is afraid of the interaction. Teachers shouldn’t have to be babysitters, but they must, in effect, ask themselves the following questions:

1. Where in the field of education is the model for review and evaluation of abstract critical thinking?

2. How are we creating in our students positive ways to think, effective ways to evaluate the choices they are given?

3. How can I role-model good behavior within the classroom environment?

To be sure, teachers are expected to micro-manage each minute of instructional time to reflect the state, district, and school’s educational goals, but what about finding the best practice with regard to the ways that kids learn? It is the prerequisite of each teacher in every classroom to provide education, no matter what the learning ability.

How does Scholastic Chess relate to different needs and abilities? Most of you in this room recognize the impact that chess learning has on your club members. It is educational in ways that defy contemporary methodologies, yet it is traditional in the way that learning takes place.

Pattern recognition plays a vital role in decoding text, and is an important part learning to read. Chess learning satisfies many of the requirements for early learners, especially in the ELA categories.

With regard to science, forming a hypothesis, testing a theory, repetition of the test, analysis, and assessment (critical thinking) are all required to fully understand a solution to any chess problem. These brain activities occur in all of us at every level. They are beneficial and essential to the development of ‘learning ability’. 
I would also like to re-assert the fact that Chess is one of the oldest tools in the educational arsenal of academia for at least 17 centuries. Royal families, who tutored their children in the arts, used chess to entertain and empower each other, as well as to impress and convey messages to favored guests. Ambassadors used chess skill to win the support of foreign dignitaries. Generals have used chess to articulate strategy and tactics to their subordinates. Royal Advisors used chess as a way to discuss delicate and complex issues with their Kings and foreign leaders.

The board game of Chess in its purest form, provides a unique format for developing mathematical and reading skills. Chess Problem solving develops in tandem with analytical skill and decoding textural formation. Chess theory, which is rooted in abstract thinking comes packaged in a clearly defined framework of 64 squares and 36 pieces. It is universally adaptable to culture, language, and age of its players, as well as existing in cutting edge technologies which allow it to be enjoyed globally, in every country at any hour of the day. The fundamental skills of Chess are easily attainable. I like to compare the study of chess by quoting Einstein, who summarized his observations about Science in the following way... “The whole (idea) of Science is nothing more than everyday thinking; refined.” Einstein was not an aficionado of chess, by the way. It does bear to say that if one sees a relevance to study something, then it requires refinement to truly understand. Teachers must pursue the relevance of chess and let the study of chess be relevant to other subjects, including: music, art, theater, history, religion, mathematics, social studies, philosophy and science. This also means that the links to chess and currently accepted subject material need to be better defined so that curriculum designers can confidently incorporate scholastic chess into schools and classrooms of all kinds without reservations or doubts about the benefits.