

Inspiring Tomorrow's Champions
Essentials in Elite Youth Sport Development

Optimizing Your Youth Talent Development System

Part 1: Tomorrow's Champions are made

Peak Performance Coaching Conference, February 2010

Frederick G. Sturm

Tomorrow's Champions are not born, they are made

What has been an unreliable indicator for success based on the research about past and present champions?

What does "talent" mean?

"The word TALENT can be vague and loaded with slippery overtones about potential, particularly with young children."

" Research shows that being a prodigy is an unreliable indicator of long term success."

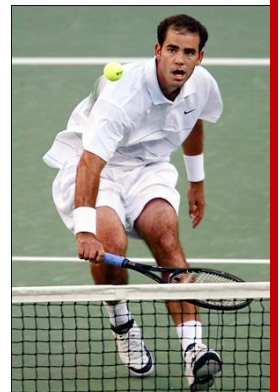
Daniel Coyle, The Talent Code



What does "talent" mean to the expert coach ?

"It is not about recognizing talent, whatever the hell that is. I have never tried to go out and find someone who's talented. First you work on the fundamentals and pretty soon you find out where things are going."

Robert Lansdrop, tennis coach
of Tracy Austin, Pete Sampras,
Lindsay Davenport



Tomorrow's Champions are not born, they are made

What have been reliable indicators for success based on the research about past and present champions?

Tomorrow's Champions are not born, they are made

It is about hours

- a lot of them, the right kinds of them, and the quality of them

It is about having a large group of aspiring champions

- an "athlete centered" philosophy
- system that provides opportunities for everyone throughout the long term development process

It is about having expert coaches

- at each level of development

It is about HOURS : a lot of them

- long term development process:

effortful, focused, deliberate

- baby steps

- general world class standard:

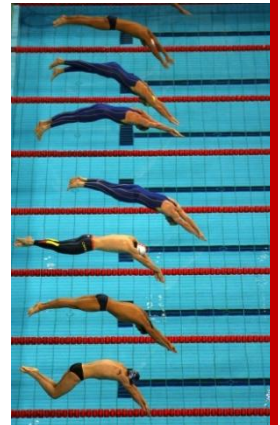
the minimum of 10.000 hours

- know how many hours you need for your sport
- used to determine the ideal start of development



It is about HOURS : a lot of them

- standard for world class expertise is very dynamic
 - increase in the total number of competitors
 - improved development methods
 - increasingly higher competence standards
- a reliable indicator of superior performance
 - separates experts from non experts
 - separates elite experts from experts
 - separates Olympic medalists and Olympians



It is about HOURS : the right kinds of them

- Deliberate play
 - objective: to increase intrinsic motivation and enjoyment, the two most important factors related to sport commitment
 - *"pick up"* games with no supervision
 - loosely structured "game activities" with minimal coach involvement



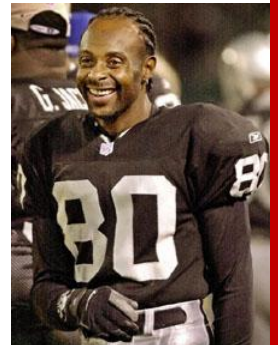
It is about HOURS : the right kinds of them

- Sport specific Deliberate Practice

- designed specifically to improve performance
- it can be repeated a lot
- feedback is continuously available
- highly demanding, mental work

*"If you only practice with your body –
no amount of time is enough"*

- it is not always very much fun



It is about HOURS : the right kinds of them

Undesireable difficulty

Desireable difficulty

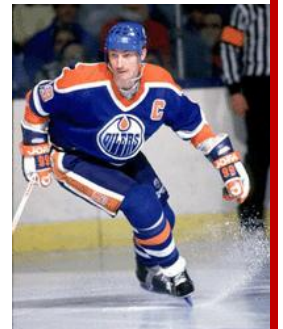
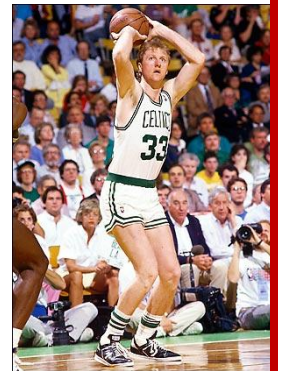
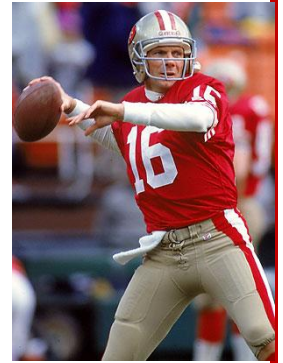
Automation stage



It is about HOURS : the right kinds of them

Deliberate Practice: How does it work?

- perceive more
 - anticipation is one way for an expert to get around the limits of reaction time
 - understand better, respond better, and react faster to sport specific familiar patterns / visual cues



It is about HOURS : the right kinds of them

Deliberate Practice: How does it work?

- know more
 - acquiring extensive sport specific knowledge needed to excel by both the athletes and coaches

It is about HOURS : the right kinds of them

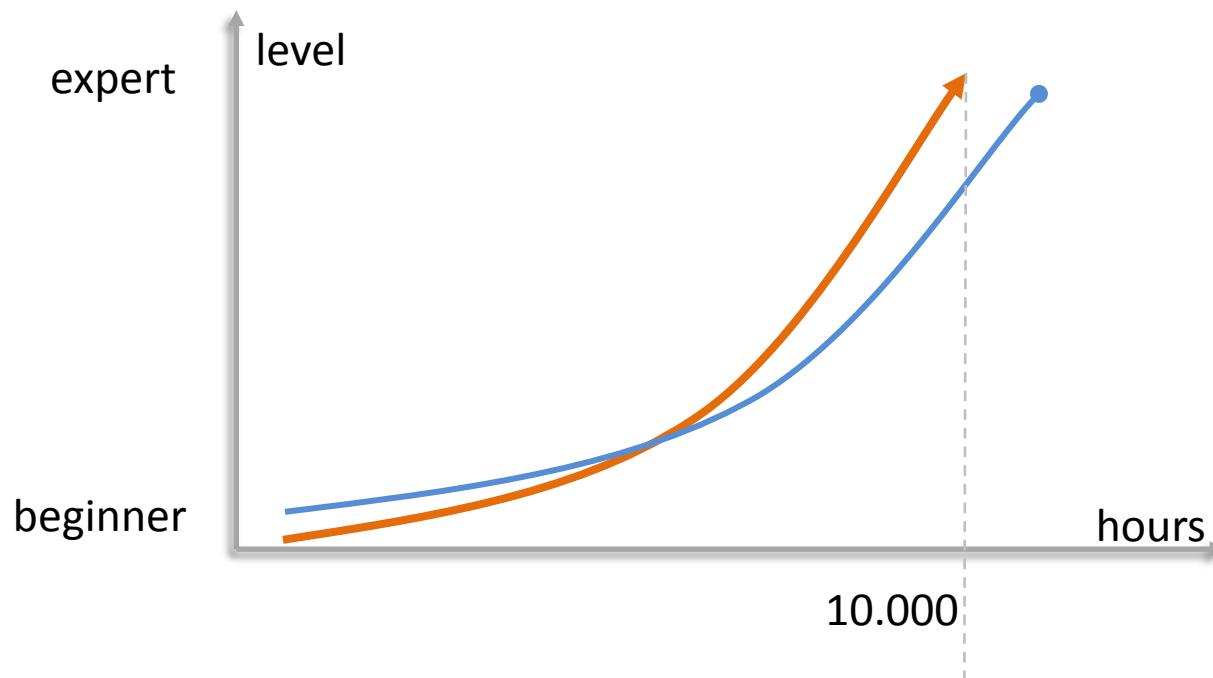
Deliberate Practice: How does it work?

- remember more
 - Expert working memory: the ability to get to information stored in long term memory, in a fast, reliable way
 - "chunking of information": a way for an expert to get around the limits of short term memory
 - ❖ *Letters and words*
 - specific, familiar, personally meaningful

It is about HOURS : making them as good as they can be

Human beings have the same genes and the same possibility to express those genes. Why, then, do people not turn out to be the same after 10.000 hours ?

- "the fast track development path"



It is about HOURS : making them as good as they can be

- The Expert Coach

- uses the best teaching and learning methods
- can apply the concepts of deliberate play and deliberate practice in the optimal, appropriate context
- uses training activities that produce the highest amount of transfer to competition activities

- The Athlete

- tomorrow's champions are deeply engaged in physical and mental effort

❖ Chess: Polgar sisters story



It is about having a large group of aspiring champions

and keeping all of them in your sport development system
for as long as it is possible

- system that provides opportunities for everyone

*FACT: one's initial ability in a sport has not
been a reliable indicator of one's
final ability in that same sport*

- athlete centered support system
 - healthy and positive team environment
 - family support

It is about having a large group of aspiring champions

and keeping all of them in your sport development system
for as long as it is possible

- experience that is fun, enjoyable and meaningful
 - playing is fun and "doing your best" is fun
 - learning, getting better and competing are fun
 - winning and "playing to win" are fun
- finding the optimal development pathway in your sporting culture:
 - through the school or club system, community programs
 - High performance pathway ? Recreation/Participation pathway?

It is about having a large group of aspiring champions

Who? Types of athletes:

- Fast starters:

- fast learners;
- early maturers;

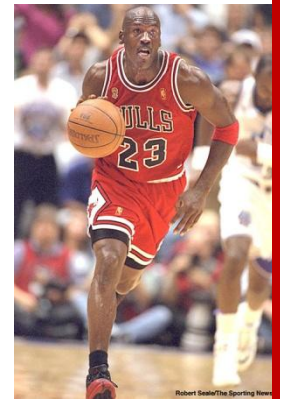
"prodigy", "early promise"
date of birth matters,
maturation age matters



- Slow starters:

- slow learners;
- late maturers;

first to "not make the cut"
❖ Michael Jordan



- Specialists:

- early specialists;
- later specialists;

❖ Tiger Woods
❖ Annika Sorenstam



It is about having a large group of aspiring champions

Who? Types of athletes:

- Late discovery:
 - athlete who found his specialization within the sport at the later stage
 - ❖ Usain Bolt, Ivan Miljkovic

The "enough" factor:

- athlete's physical characteristics and abilities
 - ❖ Kobe Bryant
- enough good athletes in your sport
 - ❖ USA Men's Volleyball



It is about having expert coaches

at each stage of development

- having the right people, and having them in the right roles
- GE 2001 study on excellence and sustained excellence:
 - "deep domain specific knowledge"*
 - "expert knowledge in the field"*
- coaches, just like athletes, need a lot of hours in their specific sport and at their specific level to become expert coaches:

*to possess very deep sport specific,
level specific knowledge*



It is about having expert coaches

Coaches are Teachers

"It is difficult to say. When I teach, I give everyone my best. What happens after that, who can know?"

Hans Jensen, when asked to judge which of his two music students is the more talented and had more potential

"The high quality of education depends on the high quality of teachers".

Pekka Himanen about Finnish education, the best in the world

Tomorrow's Champions are not born, they are made

It is about hours

- a lot of them, the right kinds of them, and the quality of them

It is about having a large group of aspiring champions

- an "athlete centered" system that provides opportunities for everyone throughout the long term development process

It is about having expert coaches

- at each level of development

Optimizing Your Youth Talent Development System

Tomorrow's Champions are made

Thank you

Inspiring Tomorrow's Champions
Essentials in Elite Youth Sport Development

Optimizing Your Youth Talent Development System
Part 2: The High Performance System Checklist
Of Essential Elements

Peak Performance Coaching Conference, February 2010

Frederick G. Sturm

The High Performance System Checklist of Essential Elements

- everyone needs to get a *lot of hours* and everyone needs to get an early start (in some sport activity):
 - early specializers model (Spartek Tennis Academy)
 - late specializers model (USA, Serbia)
- an "*athlete* centered" system that provides opportunities for everyone throughout the long term development process
- *expert coaches* at each stage of development

The High Performance System Checklist of Essential Elements

- Early Years: playful, fun and enjoyment years
- the first 3- 6 years of participation,
and for ages 12 years and under



- Middle Years: the specialization years
- next 3 – 4 years,
often between 13 – 16 years of age



- Later Years: the acquisition of expertise years
- next 3 – 4 years
16 -17 years of age and older



development

performance

age 6 - 12

13 - 16

17 - 21

21 +

early
specialists

sport specific
experience

late
specialists /
samplers

broad/multi
sports
experience

sport specific
specialization,
development
YNT / JNT
selection

JNT to SR team
selection

SR team to
major event
selection

* not for early maturation sports

Early Years:

The main focus is on building up intrinsic motivation and enjoyment. These are the two most important factors for sport commitment.

Playing is fun, "doing your best" is fun.

Early Years: About the HOURS

- for the "samplers": 2 -5 hours per week
- for the early specialists: 10 or more hour per week
- deliberate play activities for the large majority of time, remaining time for deliberate practice activities
- everybody learns how to do the basic sport specific skills and movement patterns in the same way

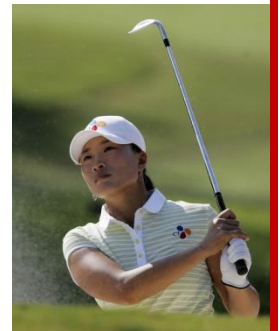
Early Years: About the HOURS

- competition
 - participation for everyone
 - appropriate variation of the "game like" activities to make them fun and enjoyable
- ❖ The Spartek Tennis Academy philosophy:
 - No official tennis competitions during the first three years.*
 - "Technique is everything! Play tournaments without good technique is a big mistake!"*
- ❖ Korean golfers on the practice range
- ❖ Danish Kids-Volley

Early Years: About the Athletes

Recommended elements:

- "athlete centered" support system
 - family, coach, sport program
- participant friendly programs
 - convenient location
 - convenient time of day
 - reasonable financial costs
 - reasonable number of days per week demands
- on the lookout for the "carrot":
 - ❖ early personal success
 - ❖ Si Ri Pak and The Korean Women's Golf
 - ❖ Anna Kornikova and The Spartek Tennis Academy
 - ❖ 1984 Olympics and USA Men's Volleyball
 - ❖ Singapore Youth Olympic Games 2010 and ???



Early Years: About the Athletes

Early Specialist: - someone who participates 10 or more hours per week

- there is a need for them in early maturation sports: girl's gymnastics, girls' figure skating
- high reward: early start and more development hours have been a reliable indicator of long term superior performance

Sampler

Fast Starter

Slow Starter



Early Years: About the Athletes

Early Specialist:

- high risk: constant demand to perform under pressure can take the fun and enjoyment out of the experience
 - early drop out
 - physical and psychological fatigue, burn out
 - sense of unfulfilled expectations

The large number of hours is NOT the problem, too much performance under pressure is.

Sampler

Fast Starter

Slow Starter

Early Years: About the Athletes

Early Specialist

Sampler: - someone who participates from 2 to 5 hours per week

- often participating in 2 or more other sports during these years
- this athlete will eventually choose one sport to specialize in, and will become Late Specialist

Fast Starter

Slow Starter

Early Years: About the Athletes

Early Specialist

Sampler

Fast Starter: - someone who is developing at a faster rate than the others

- physical and / or cognitive maturation advantage
- special environmental circumstance opportunity (parent influence)
 - ❖ The Canadian Junior Hockey
 - ❖ The Czech Republic Junior Soccer

Slow Starter



Early Years: About the Athletes

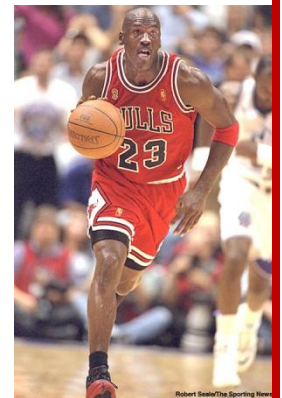
Early Specialist

Sampler

Fast Starter

Slow Starter: - someone who is developing at a slower rate than the others

- physical and / or cognitive maturation disadvantage
 - ❖ Michael Jordan
 - ❖ Paul Carroll



Early Years: About the Athletes

Ideas to appropriately develop these different kinds of athletes

- The use of homogeneous groups can make the participation experience more fun and enjoyable for everyone and help coach to make assessments
 - divide into 2 or more groups by date of birth per age group
Jan 1 – June 30 group, and July 1 – Dec 31 group
 - divide into 2 or more groups according to body size or height

Early Years: About the Athletes

Competitive activities

- participation oriented, not performance oriented
- should be structured so that comparisons between athletes is not the focal point
- the use of competition between athletes can lead to some negative feelings:
peer envy, humiliation, discouragement

Early Years: About the Expert Coach

He or she: creates an "athlete centered" environment

- physically and psychologically safe
- encourages positive coach and peer relationships, meets the need of "belonging"
- teaches and practices the rules and spirit of fair play and good sportsmanship
- encourages and praises "doing your best" effort to increase motivation and confidence
 - Carol Dweck study
- provides participation opportunities for everyone
- is "good with and good for" these young athletes



Early Years: About the Expert Coach

He or she: creates an "athlete centered" environment

- is friendly, fun, playful, relentlessly positive and encouraging, supportive
- strives to make a fun and enjoyable experience for all participants:
 - for tomorrow's champions
 - for tomorrow's recreation level athletes
 - for those who will stop participating
- understands the importance of and knows how to build intrinsic motivation and enjoyment

Early Years: About the Expert Coach

He or she: creates the optimal development environment

- educates these athletes about the learning process:
 - making early mistakes is not a sign that one is in the wrong sport
 - making mistakes is an important part of learning
 - it is OK when it is difficult to learn how to do a new skill
- holds these young athletes accountable to appropriate performance standards

Early Years: About the Expert Coach

He or she: creates the optimal development environment

- is PE teacher, local coach, well respected expert for these athletes
- has a good mastery of the basic, sport specific fundamental skills
- knows how to make the deliberate play and practice fun



Middle Years: specialization by sport

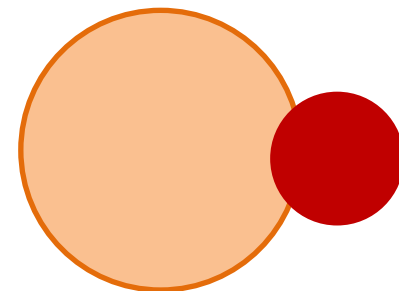
The main focus is on the development and mastery of individual, sport specific skills and other sport specific activities (fitness, strength, etc).

Learning, getting better, and competing (meeting challenges) are fun.

Middle Years:

About the HOURS

- these are the "school of sport specific skills" education years
 - ❖ Serbia, Brazil
- 10 – 15 hours per week
- Important development stage
 - majority of time: training activities and competition like activities
 - remainder of time: competition



training > competition

Middle Years: About the HOURS

- deliberate practice and deliberate play are the best use of the training hours
 - majority of time: deliberate practice activities
 - remainder of time: deliberate play activities

Competitive activities for everyone:

- through school, club or local community
 - local, regional, national,
-
- High Performance activities:
 - HP tryouts, HP camps, HP all star events
 - introduction to international competition



Middle Years: About the Expert Coach

He or she: creates an "athlete centered" environment

- physically and psychologically healthy
- encourages positive coach and peer relationships
- "keeps hope alive": encouraging, motivating
- teaches and practices the rules and spirit of fair play and good sportsmanship
- insists on "doing your best" and "playing to win"

Middle Years: About the Expert Coach

He or she: creates an "athlete centered" environment

- provides development opportunities for everyone
- provides competition opportunities for everyone
 - an important need for motivation and for athlete development
 - a substitute player can get discouraged and lose motivation ❖ The Sweden School of Volleyball
- is "good with and good for " these young athletes
- understands the meaning of fun for these athletes
- strives to make most meaningful experience for all participants

Middle Years: About the Expert Coach

He or she: creates the optimal development environment

- is well respected and an expert in the sport at this level
- creates the optimal deliberate learning and practice environment
- understands the Laws of Learning and uses the best teaching methods for motor skill development
- makes deliberate practice activities fun and challenging
- understands the importance of committing to the "aspiring champion's" short term and long term development needs



Middle Years: About the Expert Coach

He or she: creates the optimal development environment

- understands the difference between chronological and maturation age
 - adapts the training activities (strength and power) for both groups
- holds these athletes accountable to appropriate performance standards
- builds confidence, motivation and persistence through the use of deliberate practice
 - confidence and persistence are very important traits to acquire during the Middle Years

Later Years: the acquisition of expertise

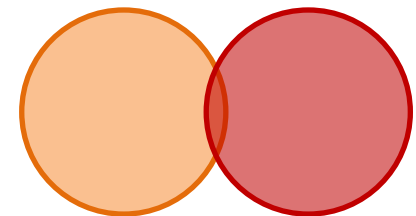
The main focus is on improving performance with an emphasis on competition activities.

“Playing to win” and winning (competitive success) are fun.

Later Years:

About the HOURS

- Big volume. High intensity. Year round. 15 -20 hours per week
- deliberate practice is the best use of the training hours
 - high majority of time: deliberate practice activities
 - remainder of time: deliberate play activities
- competition and training hours
 - majority of time: competition and competition like activities
 - remainder of time: training activities



Balance training / competition

Later Years: About the HOURS

Competitive activities for everyone:

- through school, club, or local community
- local, regional, national
- High performance activities
- International competition activities such as Youth National and Junior National Activities

Later Years: About the Expert Coach

He or she: creates an "athlete centered" environment

- physically and psychologically healthy
- encourages positive coach and peer relationships
- "keeps hope alive": encouraging, motivating
- practices the rules and spirit of fair play and good sportsmanship
- insists on "doing your best" and "playing to win"
- is "good with and good for" these athletes

Later Years: About the Expert Coach

He or she: creates an "athlete centered" environment

- understands the meaning of fun for these athletes
 - getting better and doing your best
 - competing and playing to win
 - having professional sports career
- aspires to make most meaningful experience for all participants:
champions and aspiring champions
- serves as a mentor, but also works in cooperative way



Later Years: About the Expert Coach

He or she: creates the optimal development environment

- is well respected and an expert in the sport at this level
- creates the optimal deliberate learning and practice environment
- understands the Laws of Learning and uses the best teaching methods
 - in the refinement of previously learned skills
 - in acquisition of sport specific, elite level skills

Later Years: About the Expert Coach

He or she: creates the optimal development environment

- helps athlete to further his/her INDIVIDUAL sport specific development
- helps the athlete to identify his/her "signature mark" in the sport
- holds these athletes accountable to appropriate performance standards



The High Performance System Checklist of Essential Elements

- everyone needs to get a lot of hours and everyone needs to get an early start
- an "athlete centered" system that provides opportunities for everyone throughout the long term development process
- expert coaches at each stage of development

Optimizing Your Youth Talent Development System

The High Performance System Checklist of Essential Elements

Thank you