

# *TRACK* **COACH**

**2020 / ISSUE 231**





# TRACK COACH

Spring 2020 — 231



The official technical  
publication of  
USA Track & Field

|   |            |
|---|------------|
| A TALE OF TWO CLINICS   | ..... 7356 |
| I CAN DO THIS - AN INTERVIEW WITH RENALDO NEHEMIAH                                    | ..... 7364 |
| SUPPLEMENTARY TRAINING FOR SPRINTERS AND<br>HURDLERS THAT ISN'T SUPPLEMENTARY         | ..... 7371 |
| VIRTUAL TRAINING: THREE TIPS, THREE CONS AND<br>THREE PROS OF ONLINE FITNESS TRAINING | ..... 7377 |
| YOU CAN BECOME A HUMAN SPRING   | ..... 7380 |
| USATF UPDATE ON COVID-19 CONCERNS   | ..... 7383 |

# TRACK COACH

FORMERLY TRACK TECHNIQUE

231 — SPRING 2020



**USATF**

The official technical  
publication of  
USA Track & Field

ED FOX.....PUBLISHER  
RUSS EBBETS.....EDITOR  
TERESA TAM.....PRODUCTION & DESIGN  
FRED WILT.....FOUNDING EDITOR

## **PUBLICATION**

Track Coach is published quarterly by  
Track & Field News,  
2570 W. El Camino Real, #220,  
Mountain View, CA 94040 USA.

The Summer 2020 issue (No. 232)  
of Track Coach will be e-mailed to  
subscribers in July 2020.

## **SUBSCRIPTIONS**

\$19.95 per year, U.S. or foreign.  
Track Coach became a digital-only  
publication in 2015. Track & Field News  
subscribers get free access to  
all Track Coach articles.  
See [www.trackandfieldnews.com](http://www.trackandfieldnews.com).  
Click on "subscribe"

## **BACK ISSUES OF TRACK COACH**

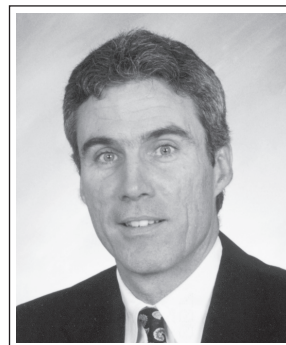
Many back issues of Track Technique/  
Track Coach, #92-208, are available  
singly at \$5.50 (U.S. delivery)/  
\$9.50 (foreign delivery) each  
postpaid. No issues previous  
to #111 are available.

To order, send your check to

**Track Coach**  
2570 W El Camino Real,  
Suite 220,  
Mountain View, CA 94040

FROM THE EDITOR

# **RUSS EBBETS**



## **RECORDS AND RECORDS**

The New Jersey Turnpike has long been one of the state's great public relations nightmares since the day it opened to traffic in 1951. The Turnpike is a 117-mile asphalt ribbon running north to south splitting the state in half. When things are moving a two-hour trip will leave you convinced New Jersey begins as a series of nauseating oil refineries; that becomes countless monolithic warehouses, with half the vehicles on the Turnpike tractor trailers the size of small battleships that move at speeds both unreasonable and improper.

What you are not going to see from the Turnpike are the beautiful rolling hills of Northwest New Jersey, the miles and miles of farmland, the eerie Pine Barrens or the Jersey Shore. New Jersey's eastern shoreline is an 125-mile series of attractive beaches and beach towns that rival anything in America. Almost every Bruce Springsteen album champions some aspect of beach life that the locals cherish.

Speaking of *Born To Run* (or jump or throw), New Jersey also has a rich track & field history. There was Plainfield's Milt Campbell who took Olympic decathlon silver as a high school junior in 1952, before taking the gold in 1956. For another, there is Willingboro's Lewis family. Nine-time Olympic gold medalist Carl, of course, had a legendary career. And remember that sister Carol held the national indoor high school record in the long jump for 35 years. The Clark family—all-stars at Columbia High School in Maplewood—followed Joetta's success with a lot more by brother J.J. (now coaching at Stanford) and then sister Hazel. The 2000 USA women's 800 Olympic team was all-Clark: Hazel, Joetta, and sister-in-law Jearl. Lewis and Clark, imagine that.

Essex Catholic H.S. of Newark was home to Marty Liquori, the #3 prep to break the four-minute mile in high school in 1967. Mike Keogh soon followed and got close to Gerry Lindgren's records on his way to winning the Golden West as a high school senior. He went on to have a stellar career at Manhattan and ran the 5000 meters for Ireland at the 1972 Olympics. Essex can also boast some great throwers. Coach Tony Naclario once had three 60-footers in the same class. But most agree his "find" had to be the day he caught a kid breaking windows, from a long distance. He convinced Mark Murro to trade the stones for a javelin and soon the national high school and ultimately the American record were his. Murro was one of the few men in the world to top the 300' mark with the old javelin.

CONTINUED ON NEXT PAGE



## EDITORIAL COLUMN

*Continued from page 7354*

And then there is the small town of Scotch Plains. Scotch Plains is about a third of the way from New York City to Philly on an old stagecoach route. In 1972 Vince Cartier from Scotch Plains ran away from the field at Princeton's Jadwin Gym, running an indoor mile high school record of 4:06.6.

I distinctly remember the news hitting the track table at Villanova that night. A NYC teammate had the scoop, as Cartier was a close friend. Cartier was the son of a professional middleweight boxer. The race report was pretty simple. Cartier took the lead, separated from the field and never looked back. The 4:06

caused some general concern at the table—would he choose Villanova or Manhattan? Would we be running with him or against him? In the end Cartier went to Florida and had a solid collegiate career. Cartier's indoor mile high school record, against only high school talent, lasted until 2010, 38 years.

They say lightning never strikes twice in the same place but at Scotch Plains-Fanwood it did. Most would agree that any guy who gets close to 15 seconds in the high hurdles is doing pretty good. If you get down to a low 14 you're probably state champion material. Break 14 and you're in the conversation as one of the top guys in the country. Thirteen seconds, 13-seconds? Probably won't happen, can't happen. Probably.

But it did. In fact, Renaldo Nehemiah did it three times in one day as a high schooler. The third try proved to be the charm with his high school (hand-timed) record of 12.9. How impossible is that? One needs to be reminded that the "adult" world record for the 110HH was 2/10ths of a second slower for a similar race. Granted, there is a big difference between the 42's and the 39's but even the stone deaf could hear this freight train coming.

Nehemiah also ran the 330IH in 35.6, one of the fastest all-time in this event. I'm willing to wager most high school programs don't have anyone who could do that time on the flat.

There is more to the story—college, Penn Relays, the 49ers but I'll let Renaldo Nehemiah fill in the details with his interview on page 7364.

# SUBSCRIBE TO T&FN

[www.trackandfieldnews.com](http://www.trackandfieldnews.com)



The basic subscription is Digital. You get full and immediate access to the T&FN articles we post almost daily on our web site. Often results and analyses of a major meet will appear on the site the next day. AND—you'll get eTrack, our weekly results newsletter which keeps you fully informed about all the recent major marks in the sport, U.S. and foreign. You also get unlimited access to Track Coach digital articles.

## TRACKING ALL THE ACTION.

It is now again possible to get an ink-and-paper issue of T&FN each month. Starting with the January 2019 issue, we are printing T&FN again. Issues are mailed at the end of each month. This option has been created for those who have no computer or digital access or are otherwise unhappy with digital only.

| Annual U.S. Subscription Rates |       |
|--------------------------------|-------|
| Digital only                   | \$79  |
| Print only                     | \$79  |
| Digital plus print             | \$109 |

**Let us recommend:** Print + Digital as the best option. You get the timeliness of digital, plus eTrack, and you'll also get a printed copy for your own archives. This makes you the complete track fan.

Track & Field News  
2570 W El Camino Real, Suite 220 • Mountain View, CA 94040 • Phone 650/948-8188

# A TALE OF TWO CLINICS

Two Clinic directors are interviewed here: MF is Mickey Ferri who directed the Gates-Chili HS clinic in December 2019. It was part of “Summer Sports Performance Clinics—Bought to you by USATF and Del Norte [CA] High School” (where Ferri coaches). RE is TC editor Russ Ebbets who directed the USATF-Niagara Clinic Weekend for three years; In December 2019 he resurrected that clinic—decentralized to cover local areas in the state.

## 1. What is your experience with doing or being a part of clinics?

**MF** – I planned, organized, marketed, and hosted the clinics. USATF generously provided a grant, which was used to cover part of the cost of the clinics and allowed the project to come to fruition. Once I was informed that USATF San Diego received the grant to host clinics in San Diego, I took the lead on making it happen!

**RE** – In the late 1970’s John Metallo, a coach at Gloversville HS in upstate New York, ran the Section 2 Clinic each spring. The clinic presented the top local track coaches and many of the top coaches from collegiate programs from throughout the East.

It was about four years after I got the Union College coaching job that I followed Metallo’s lead and did an all-events clinic in December. I copied his modular schedule with

four hourly sessions, a half-hour for lunch and a final wrap-up session with a hypnotist demonstration that was loosely tied into sports psychology entitled something like—The Powers of the Mind.

Thirty seconds into the demonstration I was furious. This was the biggest crock I had ever seen. While the first four hours up to that point

had gone great I felt this charade was going to ruin everything. Within two minutes I had a change of heart.

In that two minutes the hypnotist had his 10 volunteers clucking like chickens, swimming on dry land, feet stuck in cement and one poor soul screaming at the top of her lungs about an imaginary mouse that was trying to attack her. Truth be told, I





**L to R: Bashir with girls; Allison demonstrates high-knee bounds; all kids bounding.**

was looking for the mouse.

Nobody forgot that day. The next year I tweaked a few things and by the third and final year I did the clinic we drew 890 people.

I always focused on getting clinicians who could teach. While Kevin McGill and Jack Daniels may have been the two biggest names we ever had the other staff always presented well and left the attendees, both athletes and coaches, with a wealth of information and best practices that could be implemented the following week, for a season or during a career.

In 2018 I got the thought to resurrect the clinic idea in Western New York. The Niagara Association of Western NY was behind it, we had a facility secured but the logistics of rental, logos, lodging, who handled the money and paid the bills and several other factors soon presented a chaotic situation with little chance for success. The clinic never got off the ground.

Disappointed but undaunted I flipped the clinic idea and decided to try a decentralized set of clinics on the same weekend throughout the As-

sociation. In December 2019 we did a very successful five clinics at three sites on the same weekend.

At the Reno USATF Convention Mickey Ferri from San Diego-USATF gave a short presentation on how they do clinics in California. I approached him and asked if he would be willing to share his ideas in a compare and contrast piece for *Track Coach* so other locales across the US could copy the ideas that would work for them. "A Tale of Two Clinics" is the result.

## ***2. What is the need or why is there a need of clinics in your association?***

**MF** – There are limited opportunities for middle school and high school track & field athletes in San Diego to receive instruction from top coaches and athletes. This was an opportunity for young athletes to meet some of the top track & field athletes and coaches in San Diego.

**RE** – The Niagara Association of USATF has unique challenges due to its large geographic area. The Association essentially consists of all the territory from Syracuse to Buffalo with the southern border

being the Pennsylvania state line, what is referred to as the Southern Tier. Syracuse, Rochester and Buffalo, along the old Erie Canal, are the largest cities in the Association with the smaller cities of Jamestown, Elmira, Corning, Binghamton and Ithaca along the Southern Tier. Travel times from east to west can be as much as four hours. Because of this, trying to do a central clinic always leaves somebody unhappy.

As for the need for clinics – I have long promoted the dissemination of information as critical for the ongoing life of the sport. The recent history of the Niagara Association shows great success in the sport with gold medalist Jenn Suhr, Syracuse University (D1) and SUNY Geneseo's (D3) XC teams, the running program at Fayetteville-Manlius and several of the top high school female middle distance runners coming from Rochester in the last few years. This offers a great chance to highlight and capitalize on the knowledge and expertise within the Association.

## ***3. Who was your projected audience? (athletes, coaches, parents)***

**MF** – The primary audience was



---

athletes. Coaches and parents were welcome and encouraged to attend lunch, and to observe for the full clinic if they would like - which some did!

**RE** – I have tried to promote our program to parents, coaches, athletes and officials. All these groups are invested in the sport and this is a chance to promote excellence and refine expertise.

**4. Did you have to be a USATF member to attend?**

**MF** – No, these clinics were open to all. USATF members received a discount.

**RE** – No, you don't have to be a member to attend the Clinic Weekends but one of my selling points to the Niagara Board was that this program has the potential to "prime the pump" by allowing the Association to showcase our programs and services that will in turn offer reasons why one should join.

**5. How were your clinics set up?**

**MF** – First, I met with high school athletes, parents, coaches, and athletic directors to discuss the most valuable topics they were interested in, as well as potential dates and prices for the clinics. Second, after settling on topics and dates, I located the top instructors in the San Diego area - a diverse group of 17 coaches and experts. Third, I coordinated dates with the experts, lined up a schedule, and began marketing the events.

**RE** – Due to the individual nature of the clinics set-up was at the discretion of the individual clinic directors. Lecture, PowerPoint, learn-by-doing or some combination could be used.

It is what the clinician feels they can do and feels comfortable with.

**6. How do you handle the social media?**

**MF** – For these events, I handled the marketing personally through social media, email, and speaking with coaches, parents, and athletes at events. Some of the other coaches and instructors at the clinics were helpful in marketing through their social media, email, and in-person events and practices themselves.

**RE** – Our clinics were promoted with email blasts to Association membership. We have a new Communications Chair who will send out regular tweets in the winter of 2020 for the coming March 2020 clinics. There was also a posting on the Association website.

**7. What is a breakdown of some of the costs of putting on a clinic?**

**MF** – Coaches were the most costly component—each coach was paid between \$50 and \$200 per clinic, depending on their experience level and the number of athletes they instructed. The facility also cost money to rent. Other than that, all costs were discretionary and depended on the number of athletes. For example, we provided breakfast, snacks, and lunch—but we included the food for each athlete as part of a "per athlete" budget which was accounted for as part of the ticket price.

**RE** – We printed 1000 3.5x8.5 card stock flyers that could be handed out or sent for a cost of \$84. Mailings to clinicians was \$29. The Association paid clinicians \$100 to put on the clinics and paid the \$25 liability insurance fee to USTF. All told the

five clinics in December cost the Association \$689. This March 2020 we will expand to 10 clinics.

**8. How did you publicize your clinics?**

**MF** – Social media, email marketing, and speaking with coaches, parents and athletes at events. Having a "chat" bubble on the website was very helpful as well, since several parents asked questions about the clinics prior to signing up.

**RE** – We printed orange cardstock flyers that were handed out at the fall cross-country meets. We had a notice on the Association website. Flyers to be distributed via clinicians' personal contacts. Email blast to Association membership. Flyers left at several gyms. We will use a Twitter account in the future.

**9. What was your contract or agreement with your clinicians?**

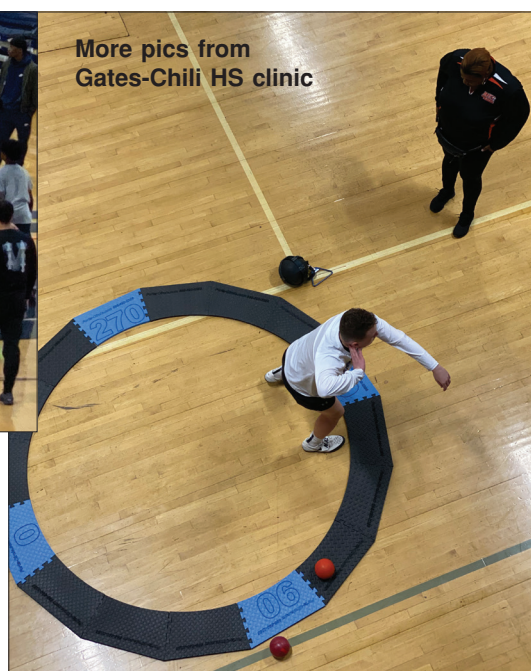
**MF** – The coaches all shared in the revenues from the clinics, and they were able to publicize their own services and practices at the clinics. Each coach was required to be SafeSport compliant.

**RE** – Clinicians were responsible for: 1. Securing a facility, 2. Handling all finances, 3. Conducting clinic registration, handouts or give-aways at their expense, 4. Having the SafeSport certification and ideally at least Level 1 Certified. The Association was responsible for: 1. \$100 stipend to each clinician, 2. Providing USATF liability insurance to each clinic site at \$25 per site, 3. Promotion of the individual clinics through website and flyers.

**10. What were the responsibilities of your clinicians?**



More pics from  
Gates-Chili HS clinic



**MF** – Each clinician gave 1-2 hours of instruction. They prepared the lesson plan, communicated it to the clinic organizer in advance, and led their session. In some cases, the clinicians stayed to observe other sessions, yet this was not required. In some cases, the clinicians brought handouts and take-home materials.

**RE** – See #9, but also clinicians were sent a “blank” copy of the registration form that the clinician was to fill out with clinic details that included:

Clinic Title: (could this be some type of attachment?)

Clinic Overview:

Location:

Directions:

Times of Registration:

Times of Clinic:

What to bring:

What to wear:

Level of material: novice, intermediate, expert, master

Teaching Method: classroom, learn-by-doing, combination

Clinic Topics:

Clinician(s) Biography:

Contact information: phone - email –

And a waiver to be signed...

### **11. What did you charge for your clinics?**

**MF** – \$60 for high school athletes. \$40 for beginner youth athletes. USATF members received a discount.

**RE** – In an effort to make these clinics as affordable as possible to all athletes (JO, HS, college) we charged a flat fee of \$10. Coaches and parents were charged \$29. Late or day of registrations added another \$5 to each group.

### **12. How did you collect the monies from registration fees?**

**MF** – Through a website set up for the events on [www.econathletes.com](http://www.econathletes.com). Thank you to Economics Athletes for helping out with the backend management of the clinics.

**RE** – Monies were collected by the individual clinician and could come by money order, check or sent electronically via PayPal. You could also pay at the door. None of our five clinics in December 2019 used a credit card.

### **13. What was your timeline for the “day of?” Your “start to finish” schedule?**

**MF** – 7-9am - arrive at the track and set up

9-9:30am - athletes arrive

9:30-12:00pm - active clinic activities - physical learning by doing (1-2 short breaks in between)

12-1:00pm - group lunch with parents and guests optional

1-2:00pm - clean up

**RE** – It was recommended to the clinicians to have things boxed and ready for distribution the night before. Seventy-five minutes before the scheduled start time open “day of” registration. Make sure all equipment is set up, copies are accessible, stay hydrated and start on time.

### **14. How did you get your presentation sites or clinic facilities?**

**MF** – Meeting with the Athletic Director and paying to rent the facilities.

**RE** – With the decentralized model one of the things we counted on was that the individual clinicians had an “in” with some facility. It was the

---

clinician's responsibility to contract with the individual facilities whether they rented it by the hour, day or some other arrangement.

**15. How were liability issues handled?**

**MF** – USATF insurance

**RE** – USATF has clinic insurance for \$25 per site. It worked well. USATF produced a certificate of insurance for each facility. This was coordinated through the national sanction coordinator in Indianapolis.

**16. What times of day were your clinics held? How was that determined?**

**MF** – 9:30-1pm on Fridays during the summer. The track and a classroom were available, and I discussed with a few athletes and parents in advance on when would be the best time.

**RE** – Time of day was determined by the individual clinicians. It hinged in part on when their facilities were available. In discussions I recommended not starting before 10am with one clinic starting at 1pm. Again, the de-centralized model meant participants were more local with minimal travel time.

**17. How long were your clinics? (half-day, 3-hours, etc.)**

**MF** – 3.5 hours

**RE** – The Niagara clinics were advertised as 3-hour clinics. Clinician evaluations recommended considering 2-hour clinics which we will experiment with in March 2020.

**18. How did you determine the pricing for your clinics?**

**MF** – I discussed with a few athletes, parents, and coaches in advance on what would be the best price - presenting a few options and what the clinics would entail at different price points.

**RE** – We settled on a reasonable pricing (cost of a lunch) for the athletes and \$29 for the adults. With a focused program, minimal travel, no lodging costs and no meal costs this all seemed to work out well. Remember, clinicians kept all the proceeds, which was their incentive to sell their program.

**19. What timeline did you use to present the clinic? How “far out” from the clinic date did you start working and publicizing your upcoming clinic?**

**MF** – Started working on it 4-5 months in advance.

Started really marketing it 4-6 weeks in advance.

**RE** – From an administrative side I started to solicit clinicians 2-2½ months prior to the clinics. For the Union clinics years ago, I worked year-round on the program. I also used word of mouth, email requests and limited mailings. There was little pressure to those asked to present. The program was presented, we'd love to have you, please advise if interested. At six weeks out I organized those who had shown interest, got the flyers printed and distributed to clinicians. Information was also sent to the Association webmaster for posting and to start the email blasts. For March 2020 I am planning on weekly Tweets referencing the clinics. I will also have at least 1000 3-fold flyers printed to be handed out at indoor meets. There will be a limited mailing to

about 100 high schools.

**20. What type of signage did you use?**

**MF** – Some USATF signage, not much.

**RE** – This is an area we need to work on. I plan on going through one more cycle of this project before this becomes a budget item. Banners are not cheap and with these clinics being a once or twice occurrence each year the purchase, shipping, collection, storage and re-distribution is one more task that I'm not prepared to handle at this moment.

**21. Are there any additional products available for sale or distribution at your clinics? (i.e. - food, t-shirts, books, etc.)**

**MF** – Not for sale, yet we included food at the clinics as part of the ticket price.

**RE** – Additional items are left to the discretion of the individual clinics. I have been more concerned with the presentation of good technical information from established coaches. If they can farm out t-shirts, food, books, etc. and still present a quality experience – great. The point here is not to get a captive audience and try to up-sell them with multiple products. There is space provided on the flyer for mentioning the availability of these products.

**22. What are the three most important things to remember when you are doing a clinic or what advice would you give someone thinking of doing this clinic project for the first time?**

**MF** – 1. Have a good vision for



what you want to teach and why it is important.

2. Get the top clinicians around in the topic—really really good coaches and experts.

3. Talk to parents, kids, and coaches a lot in advance to determine if you are doing the right thing. If people keep asking about the clinic and give you specific feedback and suggestions, then you are on to something. If people shrug and nod, they are not interested.

**RE** – #1 – start you planning early and have a pretty solid timeline from a month out and an hourly timeline 24 hours out. #2 – Strive to have everything done (handouts, registrations, copies, cash box, equipment, etc.) the night before so the “day of” you can show up, set up and go to work. There is almost always some minor problem that will arise but if all the other ducks are in a row the new issue can be resolved quickly with your full attention given to the clinic timeline. #3 – Try to present “Monday morning information.” Ideally the information should be simple to implement, cost effective and safe to implement with regards to the athletes and coaches listening to you. You will have an intelligent, motivated and eager audience. Prepare so as not to disappoint them.

**23. What were some of your clinic topics or what type of information was presented?**

Clinic Title:

Clinic Overview:

Location:

Directions:

Times of Registration:

Times of Clinic:

What to bring:

What to wear:

Level of material: novice, intermediate, expert, master

Teaching Method: classroom, learn-by-doing, combination

Payment method: (PayPal, check, money order, etc.)

Clinic Topics:

Clinician(s) Biography:

Contact information: phone -

email -

\*\*\*\*\*Registration Form\*\*\*\*\*

Name

Address

City

State/Zip

Email address

Circle one: athlete/student

coach/adult

Fees enclosed: early registration by March 14, 2020 \$10 student/athlete

\$29 coach/parent

Late/Day of registration: student/athlete \$12...\$31 coach/parent

**Waiver:** In consideration for the opportunity to participate in this event I hereby remiss, release and forever discharge the sponsoring organizations, their members and any other persons staffing this event in any capacity for any claims and demands as a result of participation in this event. I also certify that I am/have trained sufficiently for this event and that I am in good physical condition.

Signed \_\_\_\_\_

Parent must sign if under 18 \_\_\_\_\_

Return registration form to: XXXXXaddress or email address

**MF** – I encourage readers to visit the Economics Athletes blog (<https://www.econathletes.com/blog>), where there are detailed descriptions of each clinic, as well as photos of the instructors and athletes. We ran four clinics total in Summer 2019:

1. Basic Track & Field Skills
2. Speed, Strength and Power
3. Mobility, Coordination, Endurance

4. Preparation, Recovery, Nutrition

**RE** – Initially we had presentations on the throws, sprint techniques, hurdles and distance running more geared for adults. In our second go round we will have the above with the addition of a program on injury prevention, the vault and the jumps. Someday I'd like to have a program on strength training.

---

**24. What teaching format did you use? Lecture, PowerPoints, learn-by-doing, audience involvement, demonstration?**

**MF** – It was a combination of formats, which helped to keep the athletes engaged for the entire time. We began with an introduction, then from 9:30-12:00 was very active on the track and doing learning-by-doing exercises. 12-1:00 for lunch included a PowerPoint presentation.

**RE** – Presentation formats were at the discretion of the presenter. There were lectures with audience involvement, straight-up PowerPoints and learn-by-doing presentations. My directions to clinicians was to “do what you do best.” This is their chance to put their best foot forward.

**25. What type of handouts were given out?**

**MF** – Each athlete was given multiple handouts, including a personalized assessment of where they stood based on tests done at the clinic, and take-home workouts and exercises.

**RE** – Again, this is at the discretion of the presenter. What has worked for me in the past is a 2-sided summary handout and an option for the audience to receive the PowerPoint electronically if the participants give me their email address. This cuts down on paper, print costs and loading people up with paper that they don’t want or need and winds up getting thrown out. Getting an email list also helps with future contact.

**26. What type of follow-up did you have?**

**MF** – We conducted an exit survey, where we received feedback on

which parts the athletes liked most and where we can improve.

**RE** – I had a simple evaluation for the clinicians listed below.

1. What do you feel worked best about your clinic?
2. What would you do differently?
3. If you could give two bits of advice to a new clinician what would they be?
4. What do you wish you knew beforehand?
5. How did you...  
Collect money  
Handle registration
6. Regarding the money...if you used an electronic collection (PayPal, etc.) were you pleased with the service? Would you use it again?
7. If you could get some USATF signage, literature, posters, etc. what would work best for you?
8. Did you feel that the orange strip flyers helped? Did you have enough? How did you distribute them?
9. Looking ahead to March 2020. Which date do you feel would be the best for the next Clinic Weekend?

**27. What are your future plans?**

**MF** – Our plans for this coming summer include similar clinics, and potentially a week-long camp that would cover similar content in one full week, and potentially cover additional topics.

**RE** – The Niagara program is a slight financial burden to the Association but it is my hope that the Association sees a bump in membership that helps offset program costs. It also helps that these programs promote a sense of goodwill within the Association that the officers are working

diligently to offer opportunities that will improve the participation experience in the short and long terms.

**28. Any final thoughts? (anecdotes, funny stories, etc.)**

**MF** – The “Speed, Strength, and Power” clinic was targeted for high school sprinters and jumpers, and the attendees included talented high school freshmen and sophomores whose long jumps were in the range of 18-19 feet (boys) and 15-16 feet (girls). One of the coaches was Bashir Ramzy, a formidable competitor in the long jump and triple jump and currently a coach for some of the top athletes in the world at the Elite Athlete Training Center in Chula Vista, CA.

At the start of the clinic, once the athletes had arrived and taken their seats, I began introducing the coaches, reading off each of their resumes and accomplishments. Bashir is a humble and quiet coach, and he was casually standing next to me wearing a hat, sunglasses, and track jacket. He looked more like a regular guy than an elite athlete. When I introduced Bashir, I slowly read off his personal bests, including long jump (27’1”) and triple jump (53’8”) - the kids were astonished. Their eyes lit up, their jaws dropped, and they gasped. They knew they were in for a treat. For the next 2 hours, Bashir rose to the occasion. He delivered an excellent clinic, teaching and guiding kids in running and jumping technique, and demonstrating drills in ways the kids couldn’t even imagine possible. It seemed he truly opened their eyes to the possibilities in athletic development and their futures.

**RE** – When Kevin McGill did my Union clinics he brought with him



## Personalized Assessment Form

| Athlete:   |                        | Bib number:                |               |                   |                  |              |
|--|------------------------|----------------------------|---------------|-------------------|------------------|--------------|
| Speed, Strength & Power Assessment   |                        | Assessment Date:           | July 12, 2019 |                   |                  |              |
| <b>Table 1. Athlete info</b>   |                        |                            |               |                   |                  |              |
| 1. Age   |                        | 5. School                  |               |                   |                  |              |
| 2. Gender  |                        | 6. Year entering           |               |                   |                  |              |
| 3. Height  |                        | 7. Primary Sport           |               |                   |                  |              |
| 4. Weight  |                        | 8. Other sports            |               |                   |                  |              |
| <b>Table 2. Track &amp; Field Events</b>                                     |                        |                            |               |                   |                  |              |
| Rank   | Event                  | 2019 Best Performance      | Rank on Team  | Rank in San Diego | IAAF Point Value | 2020 Goal    |
| 1  |                        |                            |               |                   |                  |              |
| 2  |                        |                            |               |                   |                  |              |
| 3  |                        |                            |               |                   |                  |              |
| 4  |                        |                            |               |                   |                  |              |
| <b>Table 3. Scores from Speed, Strength &amp; Power Assessment</b>           |                        |                            |               |                   |                  |              |
| Test   | Description            | Attempt 1                  | Attempt 2     | Best Performance  | Score            |              |
| A  | Underhand shot toss    |                            |               |                   |                  |              |
| B  | Overhead back toss     |                            |               |                   |                  |              |
| C  | Standing long jump     |                            |               |                   |                  |              |
| D  | Standing vertical jump |                            |               |                   |                  |              |
| E  | Flying 30m dash        |                            |               |                   |                  |              |
|  | Total                  |                            |               |                   |                  |              |
| <b>Table 4. Written Feedback from Speed, Strength &amp; Power Assessment</b> |                        |                            |               |                   |                  |              |
| Test   | Description            | Visual Feedback from Coach |               |                   |                  |              |
|  |                        | Preparation                | Loading       | Acceleration      | Peaking          | Deceleration |
| A  | Underhand shot toss    |                            |               |                   |                  |              |
| B  | Overhead back toss     |                            |               |                   |                  |              |
| C  | Standing long jump     |                            |               |                   |                  |              |
| D  | Standing vertical jump |                            |               |                   |                  |              |
| E  | Flying 30m dash        |                            |               |                   |                  |              |

a treasure trove of audio-visual materials that could rival the Library of Congress. By the second year I whimsically advertised his talk as “The Weapons of War – from David and Goliath to the Present Day.” He requested a Super 8 projector, an overhead projector and some Coca-Cola.

I scheduled him for two one-hour talks and directed him to the south-east corner of the Fieldhouse. He led a legion of 50 coaches and athletes

to that corner and proceeded to talk “shot put” for 6 hours, non-stop!

Fast forward to 1999. I am the chiro for the US team at the Indoor Worlds in Japan. Our shot putter was Andy Bloom. Bloom was an NCAA champ from Wake Forest in the shot and discus and was having his best year topping 72’ in the shot. He grew up in Niskayuna, NY, a suburb of Schenectady, where Union was. In high school he was a NYS champ and still holds the state record in

the discus. I had never met him.

With a local kid on the team I introduced myself and told him I used to coach at Union. He laughed as he said, “I used to go to your clinics with Kevin McGill,” and then, “that’s what got me started in this,” as he gestured towards the arena. You never know where efforts like organizing a clinic are going to go, but that’s the point, this is how it happens.

# ***I CAN DO THIS***

## ***An Interview with Renaldo Nehemiah***

BY RUSS EBBETS, EDITOR, TRACK COACH

**1. Renaldo, do you remember the first time you 3-stepped the hurdles and thinking – I can do this?**

I was first introduced to the hurdles in 9<sup>th</sup> grade. There was much talk of advancing from five steps to three steps. I could not generate enough adrenaline and speed to actually do 3-stepping in practice. However, my coach Larry Thomas convinced me that on race day, I would be able to 3-step. And it happened as he said; I ran three steps for approximately seven hurdles, before I started thinking about what I was actually doing in the race and then 5-stepped the remaining 2-3 hurdles. I won the race.

**2. What is your earliest memory of sport? Was this a big part of your family?**

I played Pop Warner Football (Junior Raiders League) at the age of 10. I also played Little League Baseball, Recreation Basketball League, and

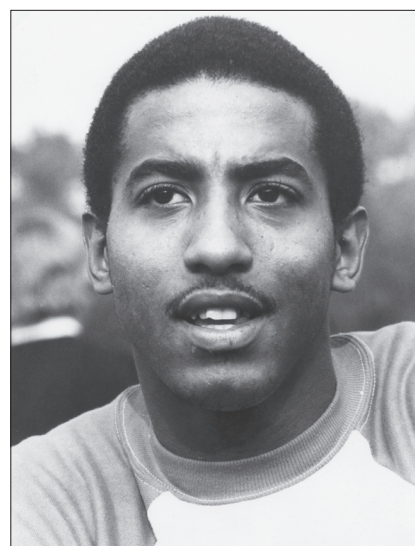
I participated in a Bowling League. The other sports from approximately the same age.

**3. Prior to high school did you play other sports or was it track & field right from the start?**

I played football and basketball and baseball primarily prior to high school. Our 9<sup>th</sup> grade was considered Junior High School back then. That's when I was first introduced to track & field as a sport.

**4. Did you have relatives or older siblings involved in track & field or other sports that influenced your decision?**

I'm the oldest of three, and my brother is 1 ½ years younger. So, we played together on our football and basketball teams. Our father was our influence. Although he didn't go to college, he did play football in high school. And he coached us on both our football and basketball teams.



PETER PROBST

Renaldo "Skeets" Nehemiah was in his hurdling prime when this picture was taken in 1981. Nehemiah broke the 110H WR three times 1979-1981 and his 12.93 at Zurich in 1981 was history's first sub-13.

**5. You were an accomplished football player in high school playing quarterback. How did you come to focus on track and field? Were the hurdles always your first choice event?**

---

I got injured during a game via a late hit and fractured my rib, thus, ending my football season. My track coach was quite pleased by that outcome, which would enable me to rest and recover and focus entirely on track. The hurdles were my first love from day one. From the time I watched Rodney Milburn running in 1975, I was hooked. I was still one of the fastest sprinters on my team. But, nothing did it for me quite like the hurdles. The thrill of being in the air while still maintaining my balance. Yet, having the strength to get down off the hurdles without falling was fascinating to me.

**6. Your high school already had a nationally prominent track program as you entered high school. Were you around when Vince Cartier set the national indoor high school record in the mile?**

I wasn't on the same team as Vince because I was still in Junior High School when he set the national record. I got to meet Vince once I arrived at Scotch Plains-Fanwood H.S.

**7. Did you regularly run the 330IH throughout high school? Did you do other events in high school other than the hurdles?**

As a hurdler, Coach Jean Poquette mandated that I would run both the 120 yd and 330 yd hurdles. Meters hadn't yet arrived nationally. I also ran the 400m on the mile relay and the 200m. I was allowed to run the 100m only once during our conference championships my senior year.

**8. You set the national high school record for the 120HH in 12.9ht. That spring, was the goal to just get the record or was going under 13 seconds the goal?**

When I set the national record in the 120 yd hurdles, my goal was the break the national record of 13.2. I also broke the national record in the 330 yd hurdles, running 35.88.

**9. Do you remember much about that race?**

Running 12.9 was memorable for the following reasons. We weren't allowed to use starting blocks for the trials and semi-finals. I ran 13.1 in the trials and 13.00 in the semi-finals. They measured the track and said it was 1 inch short. For the finals, we were allowed to use starting blocks, and the track was measured to ensure it was exactly 120 yds. I ran 12.9 in the Finals. I basically broke the national record three times that day, with the actual final race being official.

**10. Later that summer you set the high school record over the 42's. Was moving up to the higher height a difficult transition for you?**

Moving up from 39" to 42" was not difficult at all. Primarily because Coach Poquette had me practicing over the 42" hurdles. He also had me race over the 42's against the other hurdlers who ran over the 39's during our dual meets. He was constantly challenging me.

**11. Regarding hurdle technique. What was your mindset when you hit a hurdle?**

Coach Poquette spent a lot of time on my technique, wanting me to be graceful like a dancer. The few times I did hit a hurdle was due to me running faster and being consumed by my speed instead of my technique. Once I engrained my technique, I could focus more and

more on my speed.

**12. You had a body posture clearing a hurdle that was more upright (less of a tuck) than many of your competitors. Was that something you were taught or did it just come naturally?**

Hurdling from the beginning was always a feel sport for me. Thus, I ran for the smooth effortless feeling. I was extremely flexible. So, running upright may have looked awkward for some, but, it wasn't for me due to my leg flexibility and core strength. I also took gymnastics in high school and martial arts (karate).

**13. Seven steps to the first hurdle – that seems to be the new trend. Did you experiment with this?**

I only used 8 steps to the first hurdle. We practiced 7 steps and I could run 7 steps. However, I never liked the way running 7 steps felt. It felt slower and I had to get upright out of the blocks immediately. Eight steps allowed me to sprint more aggressively right out of the blocks.

What people don't know is that my block setting was back far enough that my actual first step almost landed on the start line, making my next step almost equal to that of the first step of a 7 stepper, with much more turnover and frequency. By the way, I was never beaten to the first hurdle. Eight steps always outran the 7 steps.

**14. One of the problems many topflight hurdlers have is that they become "too fast" during the race and come up on the next hurdle too soon. Was there a mindset or rhythm you repeated to keep yourself in check and avoid crashing the next hurdle?**





**Nehemiah starred at the 1979 Penn Relays, with a win in the shuttle hurdle relay (above) and phenomenal come-from-behind victories in the 4x200 and 4x400 relays.**

I was no different than any other hurdler with the spacing problems between the hurdles. I just had quicker feet. I was actually too fast in between the hurdles and it was problematic for me oftentimes. I couldn't run as fast as I wanted due to the lack of space between the hurdles, due to my speed. Then we started attacking the right post and not going over the middle of the hurdle in order to have a bit more space to attack. I was an attacking lead leg hurdler. The faster my lead leg the more powerful my trail leg was, giving me enormous power off the hurdle and into the next hurdle.

**15. In 1985 or '86 I taught at a**

**clinic with Roger Kingdom. I asked him what he was thinking as he came off the last hurdle in Los Angeles to upset Greg Foster for the gold medal. He told me he did what his brother taught him when he was just getting started, "1-2-3-4-5-dive!" Did you have a word cue you used off the last hurdle?**

My only thought coming off the last hurdle was to attack it aggressively and cleanly, and it would thrust me forward enabling me to sprint to the line. I wanted to be in sprinting position leaning forward off of it. If I managed that position, I could outspurt anyone to the finish line.

**16. Who were some of your early role models in sport? Did you idolize any of the top hurdlers of the day?**

As I said, I idolized Harrison Dillard, Rodney Milburn, Guy Drut, Martin Lauer, Willie Davenport, Dr. Thomas Hill, Larry Shipp.

**17. You chose Maryland for your college. They were a perennial IC4A power more known for their strength in the field events, as I recall. What made you chose Maryland?**

I chose Maryland because I had the best time on my recruiting trip.

---

They didn't try to oversell me. When I visited USC in Los Angeles, I was told all of the greats come there and if I wanted to be great, I'd come there too.

**18. Do you consider the 1979 Penn Relays as your college highlight? You had a weekend that has gone down in the history of that meet as legendary. You won the shuttle hurdles relay, anchored the 4x2 with a sub-20-second split (19.4r) and anchored the winning 4x4 with a 44-point split (44.3r). How much do you remember about that meet?**

The Penn Relays is legendary as told by those in attendance. My memory was quite different. It was filled with frustration and pain. Frustration because we (Maryland) were losing badly during both the 4 x 200 and 4 x 400 relays. Pain, because I had to overcome deficits that on the surface seemed impossible. In both cases, I ran somewhat angry and only wanted to have us look respectable. But, there's something about running at the Penn Relays, and the 3<sup>rd</sup> turn before the homestretch. I've always said the Penn Relays are where legends are born. So, I guess that was the case for me that day. Winning multiple relays. I continue to acknowledge my impact that day even today. Countless people I don't know will say to me that they were there that day in '79.

**19. You had run a 35-point 330IH in high school and your 44-second relay leg created quite a buzz about the possibilities for the 400IH. Was that ever part of the plan? Did you even discuss that possibility with Edwin Moses?**

I was always thinking about the bigger picture. Edwin Moses was king

of the 400 hurdles and I was king of the 110's. If we were to meet, then there would only be one king. Patriotically, I thought two kings was better than one. Two American kings at that. Besides, I enjoyed being able to talk after my 110h races. If I couldn't speak after my 44 legs on the 4 x400 relays, there's no way adding 10 hurdles over that distance would be any better.

**20. That 1979 season was your last season of college track & field. You were one of the first college track athletes to leave college early. This was a year after America's pro track league, the International Track Association, had just gone out of business. There were no shoe contracts at the time and sponsorship or endorsements from companies were not possible due to the amateur "rules" of the day. What was your plan for the immediate and near future?**

Actually, there were shoe sponsorships as a result of "Trust Funds", that the TAC [The Athletics Congress] allowed amateur athletes to set up for training and living expenses. When I relinquished my scholarship at the University of Maryland, it was because I signed a 5-year \$125,000 deal with Puma, of which \$50,000 annually went to TAC, leaving me with \$75,000 annually. That was the cost of sponsorships to an amateur track athlete at the time.

**21. Moscow 1980 is a painful subject, to this day for the Olympians who were denied their Olympic experience because of the U.S. boycott. In the time leading up to the official announcement, did you think the boycott would actually happen? How difficult was**

**the news of the announcement?**

Leading up to the boycott, I was hoping as a result of the "Miracle on Ice" during the Winter Olympics, we Summer Olympians would get our shot too. Even though it didn't look promising, I still entered our Olympic Trials in case of a last minute decision. I was going to represent our country in every way possible. Of course, I was devastated by the boycott. Training for years for our one shot to win gold. And seeing other veterans who would never have another chance to qualify due to their age. It took me almost 20 years to actually talk about it.

**22. Did you ever talk with West Germany's Thomas Munkelt (the Moscow 110H champ) about his race? And did he ever beat you head up?**

I never talked to Dr. Thomas Munkelt about his winning the Olympic Gold. I congratulated him. Yet, I knew he wouldn't have beaten me on that day. I don't believe he ever beat me. He came close at the World Cup in Montreal in '79.

**23. How much did the boycott of Moscow influence you to "look elsewhere?" You were quite a success in the Superstars competitions being the only 4x champion. Did that success give you an idea about trying pro football?**

I actually never thought about looking elsewhere after the Boycott. It was during my participation in the Superstars competition in 1981 that I met Dwight Clark of the 49ers. They had just won the Super Bowl. He and Cris Collinsworth were there as participants. In speaking to them both, they thought I was a phenomenal athlete and that the NFL,



---

specifically Bill Walsh, would love a talent like me. I voiced that since I didn't play in college, I wouldn't get drafted. They asked me if I would play and I responded affirmatively, "What red-blooded American boy wouldn't want to play in the NFL". It's America's favorite pastime.

The next morning Bill Walsh called my room. I initially thought it was a joke being played on me by Dwight and Cris, so I hung up on Coach Walsh. He called me back shortly, and I told him that if he truly was Bill Walsh to call my agent, and promptly hung up again. Later that afternoon, my agent called me and immediately asked me if I hung up on Bill Walsh? I couldn't believe it was actually him, and the rest is history.

**24. You played for the San Francisco 49ers, the most dominant football team of the 1980's and won a Super Bowl Championship with them. In retrospect how satisfying was that experience?**

I enjoyed most of my experience with the Niners. Great team, great players and great coaches. However, once I was hurt and knocked unconscious during the Atlanta Falcons game in 1983, Bill Walsh personally told me that he didn't want to see me hurt like that again. And that inevitably affected the amount of playing time I would consistently get from that point on. To my credit, Coach Walsh was a fan of mine prior to coming to the Niners. And he didn't want to expose the "World's Greatest Hurdler" to an injury like that.

**25. One of the things that gets reported on frequently is the shot you took. This was in the pre-concussion days when players**

**were pretty much expected to "walk it off" or worse, laugh it off. Any long-term consequences from that hit?**

I have no long term consequences from that hit by Kenny Johnson. I've even submitted to the NFL's concussion protocol testing.

**26. You spent three years in the NFL and decided to return to track & field. The IAAF was not for it. You had to present your case and appeal to the IAAF to be allowed to compete again. What was that experience like?**

I actually spent four years in the NFL. My 4<sup>th</sup> season I was placed on injured reserve due to a torn L4 & L5 disc injury that happened during a preseason game in Buffalo. My reinstatement battle lasted 4 ½ years. I was able to sustain the legal battle due to the finances I earned from playing in the NFL. I had never lost a legal battle at any Judicial level. Yet. Primo Nebiolo, the then IAAF president, strong-armed TAC and the IAAF to not allow me to compete since I went to the NFL. It was only after it started costing the IAAF significant dollars in defending itself, did they offer me the option to return to track. It basically came down to them offering me reinstatement if I'd stop playing professional football. I wish they had said that earlier. Track & field became an official professional sport during the 1983 World Championships. Thus, athletes like Carl Lewis were now making more money running than I was playing football.

**27. Did you feel that there was more than a little hypocrisy since you had to be aware of the under-the-table payments that were going on for years?**

That was just the times that we lived in back then. I didn't necessarily see it as hypocrisy since we were making a lot of money, \$500, \$1,000 here and there. The night I broke the World Record of 12.93, I earned \$4,000. I thought I hit the jackpot.

**28. Your status is restored, you can compete again and you get the chance to compete at the Zurich Weltklasse again. What was it about that facility that always seemed to bring out outstanding performances for you?**

Competing in Zurich was at the time the Utopian event of our times. It was billed as the biggest and best meet in the world. The buildup and pressure to perform was enormous. And I thrived on it. I always wanted to show and proved how good I was. That I was the best. It was where the best athletes were invited and where I wanted to beat the best. It was "The Defining Moment" for me.

**29. Was 1991 your last year in pro track? You were ranked 4th in the world in the 110H. The track career is winding down. Was there something in the back of your mind telling you that you should become an agent for athletes?**

I actually retired in 1992. After another setback, I had to realize that my body was no longer able to sustain the training it took. While I was running prior to retirement, I got certified as a financial advisor. I worked every off season with The Equitable and Equico Securities. Within a few years, I was offered a named partner at a brokerage firm. It was during my time there that athletes were calling on me to represent them. Over time, I relented and actually did both, the

---

financial advising and athlete representation. It was only after about six or so years, that I realized that being an agent and traveling around the world, wasn't sustainable in the brokerage business. I couldn't be on a plane in another country, or another time zone, and still be able to handle a particular client's transaction at a moment's notice. So, I relinquished my brokerage licenses and became a full-time athletes' representative.

**30. How did you get started as an athlete's agent?**

I got started with Brad Hunt of Gold Medal Management in Boulder, CO. I worked with Brad for just under two years. I didn't like commuting 10 days a month to Boulder, coupled with the extensive travel that came with the job. I was living in Maryland and I contacted Tom George, who I had met during my early running days. Tom was the VP at Octagon and he arranged an interview with their President. They wanted to revamp their Olympic division with a track & field division. Ironically, Brad Hunt started there years before I arrived. He left to start his own agency in Colorado. I was hired in December of 1998 and worked there 13 years until August of 2011. I left to start my own management and marketing company.

**31. Did track & field have a large clientele at Octagon before you arrived?**

Octagon had an Olympics division with swimming and speedskating. So, track also fell under that umbrella. I actually knew more than anyone at Octagon about track, due to my experience in it for so many years. I also got to cut my

teeth in track & field management at Gold Medal Management prior to Octagon, learning under Brad Hunt.

**32. What was your job description there and how has it changed to what you are doing today?**

I was the Director of Track and Field Worldwide. There has been no change from then to now, except that I don't have to report to a hierarchy.

**33. I'm sure you have some athletes with the potential to generate a lifetime's financial security from their athletic careers. There is a stunning statistic that 80% of pro athletes declare bankruptcy within five years of ending their career. I just finished reading a biography of Muhammed Ali and it was discouraging to see the extent to which he was fleeced by his handlers over the course of his career. How do you, as an agent, communicate with your athletes so that does not happen to them?**

For starters, I try not to work with athletes who don't value a college education. The sport still allows the athlete to go to school. Our professional season doesn't truly commence until most spring semesters end in May. I managed Allyson Felix, Sanya Richards, and Kirani James. All of them turned pro but stayed in school and graduated. I also try to assist them in getting a good financial advisor and accountant. I also try to have them invest in themselves for the first 3-4 years. Continuing to live like they're in college, building up a solid investment platform. And of course, pay their taxes.

**34. I have no doubt there are**

**agents that run the gamut from Mother Teresa to the devil incarnate. What are some basic tenets you adhere to that represent guiding principles?**

My most important characteristic is in honoring my family name. My father worked hard to give me a good name. And my family name means more to me than any client. I've built up good equity in my name. Thus, I let every client know that. As it should also be for them as well. I have a known name, so, I play by the rules. It allows me to sleep comfortably at night.

**35. As mentioned earlier you were one of the first track athletes to leave college early. Nowadays some athletes are forgoing college altogether. The results seem mixed, at best. What advice would you give those individuals?**

It varies for each athlete. They have to do their homework and ensure that whatever contract they sign isn't for short money. Otherwise, the contract isn't worth the paper it's written on. If they're leaving early, they must insist on guarantees, for as many years as possible.

**36. One of the unique things about track & field is as one transitions from novice to elite status one transitions from "one among many" to a situation where there are "many for one" with the "many" being coaches, masseurs, agents, parents, friends, family, press, NGB's, spouses, children and the list goes on and on. Who is in charge of this show? Do you have any advice or guidelines for an athlete trying to prepare their "team?"**

---

There's no precise answer to your question. Everyone, coaches, parents, friends, etc., all add their own biases into the process. It's not an easy process, because no one truly knows the truth of the business until they're actually in it. My primary emphasis is that the athlete has to love the sport. And that love will take them as far as they desire to go. Today, everyone's emphasis is on how much money they can make. And how many marketing opportunities can they acquire. All before they've actually accomplished anything. Hopefully, the parents and family have the athletes best interest at heart, and not their own interest. Meaning, they will do a thorough due diligence into the process. Talk to as many people as possible. Visit with at least 3-4 prospective agents. And allow the athlete to be involved throughout the process.

**37. From your current perspective you get to see the sport at its highest levels. What are two things you'd like to see changed and two things you hope continue into the near future?**

I'd love to see a wider range of meets for professional athletes to participate in here in the U.S. With those meets being able to be on par financially with the meets abroad. I'd love to see Network television making an annual commitment to track & field coverage. Not only during the Olympic and World Championship years. If there was significantly more prize money to be earned, I believe the best athletes would compete against one another with regularity. Unfortunately, with the apparel companies holding the lifelines of the athlete's incomes, it interferes with the competitive nature that our sport should reflect,

due to the sport being based on wins and losses and rankings. Our sport truly only rewards the top three in the world in every event. The sport is all about medals on a given (Olympic) year, than any other year. Achieving those medals dramatically impacts an athlete's ability to enhance his/her earnings.

**38. From a distance it seems like you have lived a charmed life. National high school record holder, NCAA champion, Penn Relays legend, Olympian, world record holder, Super Bowl Champion. Do you ever look back on all this and wonder how it all happened? Did you ever think that simply 3-stepping the hurdles would lead to all this?**

I've remained humble throughout my journey. I conveyed a mindset that nothing I achieved made me better than anyone else. Having a front row seat to everything I accomplished was the best it could get. And once I left the playing fields, I was just like everyone else, and no different. That humility kept me grounded. Did I know that I was blessed with gifts, yes. But, my faith in God, enabled me to recognize who should get all the glory. I was just the vessel being used to glorify Him. When I first started running organized track in the 9<sup>th</sup> grade. It was the words spoken to me from my coach and math teacher, Mr. Larry Thomas. He told me that if I worked hard, I might be able to earn a college scholarship. Those simple words inspired me to work as hard as I could in pursuit of that scholarship, in an effort to make my father proud. I knew I wanted to go to college. I was in pursuit of an education; not NCAA titles or World Records or Olympic Teams or Hall of Fames or Professional Football. My

daughters weren't born when I was doing my thing in track or football. They basically had to rely on their friends and their friends' parents to boast to them over my accomplishments. It wasn't until recently when I received a copy of about an hour's worth of races, that my daughters finally saw for themselves what I had accomplished. Yes, they had seen my World Record race in Zurich in 1981. But, that was just one race. I never allowed just athletics to define me. I always felt I was much more than that. And if all one could say about me was that I was a great athlete, then I would feel that I had failed in life.

**39. Fame and success can be a double-edged sword where one slip can send a career and life off the rails. How have you been able to handle the challenges of stardom successfully with such grace and poise?**

In tandem with my love of the hurdles coupled with my athletic gifts, I never took my talent for granted. I was able to travel the world many times over, meeting countless dignitaries and persons of prominence. I was on a natural high through every experience. It couldn't get any better than that. And I was representing my family every time and wherever I went. Most importantly, losing my mother at the young age of 14, caused me to mature rapidly. I learned at a very early age about consequences and accountability. Discipline was paramount in our home. It was taught and ingrained early. And has remained a constant in my life. And I've chosen to be a leader not a follower. Choosing my own path. Always striving to be that positive example for others to follow. Never striving for mediocrity. Aspiring to be my best!



# **SUPPLEMENTARY TRAINING FOR SPRINTERS AND HURDLERS THAT ISN'T SUPPLEMENTARY**

*Another in a useful series of articles on hurdle and sprint training by Coach Thorson.*

*MIKE THORSON, ASSISTANT COACH (HURDLES) UNIVERSITY OF MARY,  
FORMER DIRECTOR OF TRACK & FIELD/XC AT THE UNIVERSITY OF MARY*

**A look at functional training that many deem supplementary but is really essential in the training programs of sprinters and hurdlers to develop strength and explosive power**

There are many, many training protocols that coaches can employ outside of the traditional weight room to develop strength and power for sprinters and hurdlers. Many coaches would call this supplementary training. But it is not supplementary—it is a critically important and essential component in the training of a sprinter or hurdler.

Many authorities refer to this training as **functional training**. This is a term that has negative connotations for a lot of coaches because there is a lack of understanding of what functional training is, and because it often goes against conventional thinking regarding training. There are many misconceptions involved with this type of training and many coaches are very uncomfortable when training is taken from the weight room. But the reality is this: they shouldn't be threatened at all. Functional training is not meant to replace strength training. Functional training and strength

programs should work hand in hand to develop strength and explosive power in sprinters and hurdlers.

So...what is functional training? Vern Gambetta defines it as this: "Training that incorporates a full spectrum of training designed to elicit the optimum adaptive response appropriate for the sport or activity being trained." Gambetta, an author, former editor of this publication, clinician, one-time track and field coach and former NBA and MLB strength and conditioning coach, is considered the "Godfather" of functional training. He goes on to

---

say: “It means training the respective muscle groups and involved areas to work in the same manner as they are used in the activity.”

In other words, it is sport-specific training that can, in the case of sprinters and hurdlers, increase strength and explosive power. It is the latter that most coaches and athletes are really concerned with. **Strength** is the ability to exert force without regard to the time it takes to produce that force. Although there are many methods of gaining strength, it is primarily gained in the weight room and athletes obviously need a base of strength. **Power**, however, is the ability to exert a great amount of force in the shortest possible time. Or as Gambetta says in his book, *Gambetta Method (A Common Sense Guide to Functional Training for Athletic Performance)*, “Power is the ability to apply strength in the time frame required by the specific sport.”

What many coaches term strength is actually **power**. Nearly all athletic performances demand power—**high force production in a short period of time**. Strength, speed and agility are really what make up power in layman’s terms. **Functional training does an excellent job of training power because it trains true athleticism, which is often lacking in many of today’s training programs.**

**Athleticism**, according to Gambetta, “is the ability to execute a series of movements at optimum speed with precision, style, and grace.”

The basis of training athleticism is human movement—running, jumping and throwing. And that in a nutshell is what functional training is all about. The body is a “link”

system and all parts have to work in sync to produce efficient patterns of movement. Functional training trains **movements or movement patterns** and not muscles, as often is the case in the traditional weight room. It is dependent on coaches to develop athleticism.

---

### **THE BASIS OF TRAINING ATHLETICISM IS HUMAN MOVEMENT—RUNNING, JUMPING AND THROWING. AND THAT IN A NUTSHELL IS WHAT FUNCTIONAL TRAINING IS ALL ABOUT.**

---

That is what functional training is all about. It involves training in all planes of movement, employing multi-joint actions, and it has a high proprioceptive demand. Oftentimes, training that occurs in the typical weight room does not involve all the planes of movement. It trains single joint movements and there is quite often not a high proprioceptive demand.

## **CORE TRAINING**

Functional training begins with the **core—the center of the body where all powerful movements are initiated**. The core includes the muscles of the hips, abdomen and lower back. Gravity, posture and balance are all controlled by muscles of the core. Despite the importance of the core in the kinetic chain, it is often neglected or incorrectly trained.

Core training should train multi-plane movements that are functional and synergistic. Although sit-ups and ab circuits are great

core activities, there are many, many more core exercises. Most authorities would say the best core exercises are ones that include standing, upright exercises that involve a combination of flexion, extension and rotation and work a full range of motion through the movement. A couple of our favorites:

1. **Over and Under** (partner with med ball)—Stand with feet hip-width apart, knees slightly bent, with your partner right behind you and the med ball out in front of you. The athlete lifts the ball directly overhead and passes it to partner overhead. The receiving partner then squats and bends at the waist to pass the ball between their legs, making sure to keep feet flat on the surface.
2. **Duck Walk**—Start with your feet shoulder width apart and squat into a position like you are sitting in a very low chair, keeping your torso long and wide. You can walk forward or backward, making sure that the entire foot takes off and lands flat beneath the torso on each step.

## **FUNCTIONAL TRAINING BENEFITS**

There are many benefits to training functionally. In addition to the core, there are four major areas that functional training can benefit:

1. **Balance—it is the single most important component in athletic ability and it too is often neglected in training.** Functional training deals with dynamic balance, with athletes repeatedly losing and regaining

---

control of their center of gravity. It is critically important in sprinting, with the athlete alternating balancing on one leg and then the other in less than a tenth of a second. It is a skill, like most other athletic skills, that must be trained on a regular basis. There is balance equipment such as K-boards, mini-tramps and foam blocks, just to name a few, that can be used if your budget allows. There are many balance activities or exercises, however, which require no equipment. Our program incorporates balance activities into our daily warmup and training sessions. An example is a simple walking lunge done with the **eyes closed**. Closing the eyes creates an entirely new **sensory** and **balance** sensation for the athlete.

2. **Posture**—this is how an athlete holds the body and functional training can improve an athlete's ability to maintain proper posture in all different positions and planes of movement. Good posture is a must for sprinters. It allows them to direct all movements in the proper direction and with efficiency. "Sloppy" posture often leads to improper mechanics, and most authorities will agree that sprinters and hurdlers are only as fast as their mechanics will allow! Most posture training comes in the form of teaching the correct **running form drills** or what we refer to in our program as **sprint mechanics**. Two very elementary but effective posture drills are the **front to wall drill** and the **back to wall drill**. They basically involve running in place against a wall, stressing the correct sprint mechanics. Many

of the drills that are employed in the typical athlete warmup would fall into the category of sprint mechanic exercises.

3. **Stability**—Athletes must possess the ability to keep joints in line with the direction of the force being applied. Functional training does an excellent job of training this because it is constantly challenging the joint's ability to withstand mechanical shocks and movements without being displaced. Landing and taking off with great force over a small base of support (such as in sprinting) requires excellent stabilization of all the involved joints, tendons and ligaments. Poor performance and a high risk of injury will typically be the end result for athletes who do not possess the required stabilization. **Core ball** exercises with stability balls are great tools for training stability.

---

**GOOD POSTURE IS A  
MUST FOR SPRINTERS.  
IT ALLOWS THEM  
TO DIRECT ALL  
MOVEMENTS IN THE  
PROPER DIRECTION  
AND WITH EFFICIENCY.**

---

4. **Mobility**—Defined as range of motion for the joints of the body through which force can be applied, functional training demands a sound range of motion in all desired directions of movement. Many of today's athletes lack the necessary movement mobility due to the sedentary lifestyle that many have become accustomed to. Thus, it must be trained. A great exercise utilized by

some coaches to train mobility are **hurdle mobility** or **hurdle walk-over** drills.

## TYPES OF FUNCTIONAL TRAINING

There are many types of methodologies that can be termed functional training. We have already addressed two: **Core training** and **Balance**. Most of the training falls under two different categories: (1) **Plyometrics** (2) **Circuit Training**. Other types of training such as overspeed, resistance, and stretch band training also can be termed functional training. Some authorities even put pool training, hill workouts, and speed development into the functional training category. It is incumbent on the individual coach to determine what is most effective and beneficial for his or her athletes. Coaches need to be very specific and very selective in choosing exercises that lead to their overall training objectives.

We will take a quick look at both **plyometric** and **circuit training** and outline some of the training we are using in our program at the University of Mary.

## PLYOMETRIC TRAINING

**Plyometrics** are exercises in which muscles exert maximum force in short intervals of time to train the effectiveness of the stretch shortening cycle, with the goal of increasing explosive power. They are very important in increasing power by improving an athlete's ability to mix strength, speed and agility with the use of one's own body weight.

Coaches need to understand that the goal of plyometrics is to improve the relationship between maximum strength and explosive power. It is



critically important that athletes have a base of strength prior to beginning a plyometric program if the training is to be both safe and effective. "Plyometrics can only be effective if the athlete is developing basic strength," according to Vern Gambetta, who notes that plyometrics must be used in **conjunction** with other **power development** methods in order to be truly beneficial.

Another factor that coaches must consider is the training loads and time needed to recover from plyometric exercises. Low stress plyometrics require very little recovery. High stress exercises such as depth jumps can require up to three days! The weight of the athlete, volume, intensity, displacement of the center of gravity (vertical or horizontal, or both), and speed of the exercise should be taken into consideration to determine the appropriate training loads and recovery time.

Coaches must also demand that plyometric drills are properly executed. One of the keys to safe, effective injury-free plyos comes with the correct landing with an upright posture. The shock of the landing should not be absorbed just by the foot, but by a combination of the ankle, knee and hip to transfer the force to the muscles

of the body. The foot strike should be on the entire foot and not the heel or ball of the foot. An incorrect foot strikes causes the forces to be absorbed by the bones of the foot, knee and hip and not the muscles of the body. An upright posture will assist in eliminating lower back stress and injuries.

The progression of the program is important too, with the coach beginning with low impact exercises before advancing to the high stress activities that will produce greater forces on the body.

Our program includes plyometric drills nearly every day, with the exception being recovery days. Our warmup includes plyometric exercises, as do our regular training sessions for sprinters and hurdlers. A couple of plyo exercises that we frequently employ are **hurdle hops** and **standing long jumps**. We quite frequently include these types of plyometric drills in our regular workouts.

A couple of plyometric routines used by Mary hurdlers:

**Orange Multi Jump/Throw Plyometric Circuit with Med Ball (10-20 throws depending on athlete and time of the year)**

1. Overhead Back Throw
2. 1 Hop onto Box between the legs forward throw
3. 1 Hop onto Box Overhead Backward throw
4. Sitting Overhead Pass
5. Sitting Chest Pass
6. Kneeling Chest Pass
7. Backward Walking Lunge with med ball
8. Hop, Hop Throw ball from beneath the legs

**Blue Multi Jump/Throw Plyometric Circuit (20 Throws depending on athlete and time of the year)**

1. Overhead Back Throw
2. Hop, Hop Throw Overhead Backwards
3. Sitting Chest Pass
4. Hop, Hop Throw
5. Balance Toss (1 foot Chest Pass/Catch and Throw)
6. Bounding (2 x 20 meters with med ball)

## CIRCUIT TRAINING

**Circuit training** is a series of strength and fitness exercises where an athlete moves from station to station in a predetermined





order or sequence. The two primary goals of circuit training are to develop **strength endurance** and **work capacity**. Coaches should always keep in mind that strength and proper technique should come before strength endurance prior to beginning and designing circuit training. The exercises must be mastered before the strength endurance component is implemented. Often coaches will begin strength training programs with circuits and the athletes do not have the proper strength levels to safely do the circuits without injury.

We have included several of our

circuits that we use in our program. Most of our circuits include plyometric exercises and could also fall into the plyo category of training:

#### **Marauder Hurdle Hop/High Knee Circuit**

1. High Knees (Slow) 30 meters
2. Cone Hops (Small) 10 seconds
3. Walking Lunge Backwards with eyes closed 10m
4. Lateral Hurdle Hops 20" 4 Hurdles x 2
5. High Knees Backward (Slow) 30m
6. High Knees (Running) 2 x 20m
7. Hurdle Hops 30" 4 Hurdles x 2
8. High Knees (Running) 30m
9. Bounding (Big—Slowly) 2 x 20m
10. Hurdle Hops 30" 4 Hurdles x 2 with 2k med ball for women, 4k for men
11. Walking Lunge Lateral 2 x 10m
12. High Knees (Running) 2 x 20m

#### **Pirate Conditioning Circuit Number 2 (Outdoors)**

1. High Knees (Running) 40m
2. Cone Hops (Big) 2 x 10 seconds
3. 20 Pushups
4. Hill Sprints 2 x 30m
5. 25 Sit-ups
6. 1 x 150m with flats @ 75-80%
7. 20 Push-ups
8. Hill Sprints 2 x 30m

9. Backwards Running 40m
10. Walking Arms 20m
11. 1 x 150m with flats @ 75-80%
12. 25 Sit-ups
13. Hill Sprints 3 x 30m

#### **Mary Squat Thrust/Pushup Circuit**

1. High Knees (Running) 30m
2. 20 Push-ups
3. High Knees (Backward) 30m
4. 10 Squat Thrusts
5. Stationary Fast Arms 2 x 15 seconds
6. 20 Push-ups
7. Stationary Fast Arms 2 x 15 seconds
8. Walking Lunge Backwards 2 x 15m
9. 10 Squat Thrusts
10. Stationary Fast Arms 2 x 15 seconds
11. High Knees Backward (Running) 30m
12. High Knees (Running) 30m

#### **Mary Marauder Hill Circuit (Outdoors)**

1. High Knees (Running) 2 x 30m (Recovery is a 40m jog back down the hill for all exercises)
2. Backwards Running 2 x 30m
3. 2 x 30m Sprints @ 90%
4. Big Bounds 30m
5. High Knees (Slowly) 30m

6. Backwards Running 30m
7. High Knees (Run finishing with a sprint) 2 x 30m- High Knees first 20m followed by sprint for 10m
8. 2 x 30m Sprint @ 90%

## FUNCTIONAL TRAINING VS. TRADITIONAL STRENGTH PROGRAMS

Some coaches continue to be skeptical of functional training. Why do you need functional training when the weight room and strength programs can accomplish what is needed for the sprinter/hurdler they will ask. The answer is that athletes need both! You obviously need the traditional weight room for producing the basic strength. But functional training is a **must** to

build the explosive power needed by sprinters and hurdlers.

Many athletes become very strong in the weight room, but they cannot apply that strength to athletic performance. The Jamaican athletes that our program has had over the years are an excellent illustration of this concept. They typically did not perform very well in the weight room, having very little prior experience with lifting until they joined our program. They did, however, have a background in functional training and adapted to our sport specific training very well. As a result, they were able to translate their strength to successful performances in the sprints, hurdles and jumps.

## SUMMARY

**Functional training is not supplementary training.** It should and can work side-by-side with the traditional strength programs. If coaches understand the biomechanics of function and movement, are creative and innovative, they will be able to blend the two together to implement successful training programs for sprinters and hurdlers that build strength and explosive power.

## REFERENCES

- Gambetta, Vern, *Gambetta Method: A Common Sense Guide to Functional Training for Athletic Performance*, Second Edition, Gambetta Sports Training Systems, 2002
- McFarlane, Brent, *The Science of Hurdling and Speed*, Fourth Edition, Athletics Canada, 2000
- Radcliff, James, *Functional Training for Athletes of All Levels*, Ulysses Press, 2007

# TAFNEWS BOOKS NOW AVAILABLE ON AMAZON.COM

■ **TRACK & FIELD OMNIBOOK.** Ken Doherty's masterwork. 5th edition, revised, edited and updated by John Kernan. The technique and training of all events, much more. 418pp. \$45.00

■ **PEAK WHEN IT COUNTS: Periodization For American Track & Field.** 4th edition of Bill Freeman's definitive work on what periodization is and how to apply it to American track & field, all events. 147 pp. \$25.00

■ **TRAIN HARD, WIN EASY: The Kenyan Way.** 2nd edition of Toby Tanser's account of Kenyan distance running superiority and the reasons for it. Foreword by John Manners. 258pp. \$25.00

■ **THE THROWS MANUAL.** The must-have book on training and technique for the shot, discus, hammer and javelin. By George Dunn and Kevin McGill. 158pp. \$25.00

■ **TRAINING GAMES: Coaching and Racing Creatively.** By Eric Anderson, PhD, and Andrew Hibbert. Creative workouts and incentives to keep runners interested and to build team cohesion. 154pp. \$19.99

■ **THE BIG GOLD BOOK.** Metric conversion tables for track & field, combined decathlon/heptathlon scoring and metric conversion tables, and other essential data for the fan, coach and official. 188pp. With 2017 updates. \$29.95

These books were formerly out of print and not available, but we have arranged with Amazon.com to print them on demand and offer them on their website. Order directly from Amazon.com.



Available only from [www.amazon.com](http://www.amazon.com)

*Note: There may be other offers on amazon.com for used copies, but for the new, T&FN-authorized, pristine copies look for the entries with the above prices.*

# **VIRTUAL TRAINING: THREE TIPS, THREE CONS AND THREE PROS OF ONLINE FITNESS TRAINING**

*Preparing for the “new normal.”*

*BY KEN KASHUBARA*

The pandemic has shut down schools, gyms, tracks, and even parks. This environment makes it difficult for athletes to properly train and for coaches to teach. No one knows when the crisis our world is facing will end. What we should know is that the future is now; and that it is time to prepare for a new normal. Part of that normal will be less physical interaction and more virtual.

The transition will be difficult. Yet, the transition must be made nonetheless. A coach that follows these

guidelines, and has patience, will be stronger, and better prepared for the future.

## **TIPS**

### **1. Create a work space.**

Coaches should clear a room in their home and use it as their office. (SafeSport virtual training guidelines suggest that this room is not a bedroom.) Use the exact same setup for every training session. Decide where the device camera will be placed. Ensure that the space is

well-lit so students can clearly see every demonstrative movement. Coaches should wear the same type of clothing that they would during a physically interactive practice. Students will be getting a look inside their coach's home, making it even more important to keep the work space professional.

### **2. Keep it simple.**

Do not try to get fancy with exercise selection and design. If the athletes have experience with a coach's specific training plans, stick closely

---

to exercises that the students know how to do. When a coach is introducing new exercises, the coach must be sure of his/her ability to vocally describe the movement. Describe step-by-step, joint by joint. The coach should also be sure that he can demonstrate any new exercise. Many of the students will be completing the sessions on small screens. It may be difficult for them to see the movements. Furthermore, if it is a virtual one-on-one session, the coach cannot point to another student as a demonstration. Neither can the coach pause the session to show the student a video, unless the coach has another screen near enough to the camera station to show the students.

A coach could technically use a laptop for a session, and show students videos from his phone; but then again, students will be looking through small screens at smaller screens. Such a strategy will make learning more difficult than it has to be.

Coaches who struggle with physical demonstrations should use group CPU applications, much like college professors are using. On these platforms, a coach can create detailed lesson plans with videos and graphs. Such measures will take much, much longer to prepare than normal.

### **3. Be creative.**

Most students will be completing these training sessions inside their homes. They don't have a lot of space. They don't have a lot of equipment. They will have to form run in place. They might not have dumbbells. One can use water bottles, soup cans or even milk cartons as dumbbells. One

can use pillows for medicine balls. If a student only has one bungee cord for a strength workout, then the coach should learn as many exercises as possible to do with the bungee cord. Learn as many bodyweight exercises as possible. (Old school military workouts are a great place to start.)

Now more than ever, a coach's knowledge is paramount. Take the time to learn as much as possible—exercises, repetition and volume range designs, and rest strategies.

Prepare all training sessions before the class or practice. Write out the lesson plans on paper, or have a secondary device available with the workouts typed in the notes. For a coach new to virtual training, it may take a few weeks to work out all the kinks, but they will get the hang of it. It will take time, patience and practice.

## **CONS**

### **1. Dramatic, instantaneous change.**

The change from coaching a team of over 50 athletes outside at a track to online virtual coaching one-on-one is about as big a change as it gets. This is not to mention all the other massive changes going on in people's lives right now. Coaches have to prepare. Coaches have to learn new ways. The situation is chaotic, but not impossible.

### **2. Technical difficulties**

Screens will freeze. They will delay, and pause. A coach may see an athlete freeze for five seconds, and then see him/her complete twelve repetitions in a second. This makes exercise form correction

more difficult. Until our technology improves, frozen screens will have to be accepted. Coaches have to take a breath and ask the athlete to complete the exercise again if necessary.

The screen will freeze on the student's end as well. Coaches should be prepared to describe exercises or repetitions multiple times. Be prepared to demonstrate exercises twice, or even a third time. Take a breath and be patient.

Many coaches use hand signals. With small screens and camera angles, these become more difficult when teaching virtually. When a coach wants an athlete to complete four sets, for example, he should not hold the four fingers in front of his face. Place the fingers in front of a shirt, and wear clothing that contrasts with the skin. Also, hold the hand signal in the direction of the camera as so it can be seen clearly. Coaches can use their own small corner screen as a mirror to ensure that the hand signal can be seen.

Sound can be an issue as well. If a coach or student is outside, the wind can easily drown out instructions and communications. Coaches should be prepared to repeat themselves. Do not play music on either end. It is difficult enough to hear each other as it is.

Coaches should make sure that they cannot be interrupted when coaching. Not all students can do the same. They may have roommates, or parents, or siblings making all kinds of noise.

### **3. Software logistics**

Coaches and athletes must decide which type of technology to be used



for training sessions. Some students may have to initiate the call from their laptop because their laptop and phone have the same number, and a call from the coach may come through on the phone and not the laptop. Different phone companies and phone types may use non-compatible virtual applications.

Laptop and CPU platforms are better for group sessions. CPU online applications exist that are compatible across most platforms. On these apps, a meeting must be set up with a specific meeting ID and password. The coach must have emails of all students, and invite the group to the meeting.

If the coach charges money for sessions, the coach must also determine the method of payment. The coach can be paid through money transfer apps and/or online banking. If the coach is charging for group sessions, he has to determine the billing process and how to guarantee that all email meeting invitees have paid for the class.

At this moment, many gyms, coaches and trainers are setting up paid virtual teaching platforms on their personal and commercial websites. The process of creating these types of designs is slow. And expensive. These platforms also assume a large number of future paid students. It is the advice of

this article to avoid these types of platforms. Coaches should be virtually nimble, jumping between different apps, in order to serve the greatest amount of individuals with the greatest speed.

## PROS

This article chose to place cons before pros in order to end with the positives. With all of the cons listed above, positivity and patience are the two greatest traits a coach must have during these unique circumstances. After a few weeks a coach and his students will have all of the technical difficulties behind them, or at least strategies in place to deal with the negatives.

### 1. **Anyone, anywhere, anytime**

Even though people are practicing social distancing, the world is shrinking more than ever. Virtual applications are worldwide. A coach in America could get up early or stay up late to teach students from anywhere on Earth.

Start local and then expand. Reach out to current students and explain their training options. Then reach out to former students, and then find new opportunities in new places. Pretty much everyone in the world is completing virtual training. Now a coach can teach anyone, from anywhere in the world, at any time.

### 2. **Cost efficient**

Almost all online virtual meeting applications have free options. When training virtually a coach does not have to buy a bunch of equipment. A coach may normally teach from his home, which cuts down on overhead expenses. In reality, virtual training sessions do not have to cost the coach a dime.

### 3. **The benefits of exercise.**

Finally, the core, the basis of all sport, is fitness. Good health and all the benefits that come with exercise. Lower blood pressure, cholesterol, resting heart rate, and blood sugar levels. Stimulate brain function. Weight control. The creation of stress-relieving endorphins. Exercise can help people sleep better. Improve mood. Now more than ever, people need to exercise.

Often, when discussing competition strategies, coaches tell their athletes, "Don't panic!" During these unique circumstances, coaches need to take their own advice. Be safe but do not panic. Practice patience and preparedness.

Keep breathing and stay strong!

## BIO

Ken Kashubara is a Certified Strength and Conditioning Specialist and a USATF Level 2 Certified Coach in Combined Events. He has been performing virtual fitness training sessions since 2017. He does so out of his gym, Sport Heaven, in Bloomfield Hills, Michigan. For further questions he can be reached at [kkashubara@yahoo.com](mailto:kkashubara@yahoo.com)



# YOU CAN BECOME A HUMAN SPRING

*This piece first appeared in Athletics Weekly, Sept. 22, 2016.*

BY JOHN SHEPHERD

In the sprints, hurdles, throws and jumps events, power and speed are obviously paramount. An athlete in these events may have the best technique, but unless he/she can generate and apply force rapidly then the athlete is not going to maximize potential.

“Athletic horsepower” is all about overcoming resistance. An obvious example is the high jumper who needs to overcome gravity to soar skyward. It appears that athletes who are able to generate the most power have the most effective human springs—an ability which the sports scientists say *reflects lower limb stiffness*.

## ADDING SPRING

Simply put, an athlete wants to have limbs—or more specifically muscles, ligaments and tendons around the relevant joints and even cartilage and bone—that are able to

produce maximum power usually in the shortest amount of time. This is certainly the case for sprinters, sprint hurdles and horizontal jumpers.

High jumpers and throwers, for example, may need to moderate their speed to an optimum performance-producing level. Sprinting flat-out to throw the javelin, or perform a high jump takeoff, for example, is unlikely to result in the most effective throw or jump. Nevertheless, their ability to “fire” their leg muscles quickly is very important. This relies very much on lower limb stiffness—from now on in this article referred to as stiffness.

Essentially, our legs are like springs. If a spring compresses under a force it will store energy that’s rapidly released when it uncoils and, the stiffer the spring, the more powerful the return of energy. Well, the legs work in a similar way around their joints. The coiling equates to an

eccentric muscular action whereby the relevant muscles lengthen under load. Meanwhile, the uncoiling is a concentric action, whereby the relevant muscles shorten under load. The quicker the transition from lengthening to shortening, the more power generated. This reaction is also known as the “stretch reflex” or “stretch-shortening cycle”.

## MEASURING LEG STIFFNESS

Stiffness can be measured in several ways depending on the type being measured and the resources available.

It is beyond the scope of this article to go into full detail but in relevant overview. *Vertical stiffness* refers to the movements involved in hops and jumps that occur in a vertical direction and can be determined by calculating the force used to jump and the height gained. *Leg stiffness*

---

### ANALYSIS OF BOLT

Researchers reporting in the *International Journal of Sports Medicine* looked at the 2009 Berlin World Championships performances of Bolt, Tyson Gay and Asafa Powell. Despite Bolt's win in a world record of 9.58, they calculated that he had the least amount of leg stiffness and vertical stiffness compared to his two rivals, even though his peak speed of 12.3 m/sec was superior. We've seen how this can be explained in terms of stride length, a longer (but still very quick) contact time (0.091 sec) and lower step frequency (4.59 per still second).

### LEG STIFFNESS AND ENDURANCE PERFORMANCE

Running economy (RE) is seen to be in part reflexive of stiffness. RE relates to the ability of an athlete to move along at a comfortable but fast sustained speed using less energy. If, like Mo Farah, you have a high top speed, then slower paces will be much easier to maintain. Farah is therefore more than likely to have greater stiffness and to have trained specifically to develop this. Forefoot striking may also be relevant here as this leads to greater stiffness, particularly at the knee when compared to heel-striking.

### POWER OF ACCELERATION

Researchers looked into how leg strength and leg stiffness affected the acceleration, peak speed and the deceleration phases in the 100m sprint—30m-60m-100m. Regional to national-level sprinters were the subjects (100m PBs ranged from 10.72 to 12.87). The half-squat and counter-movement jump were used to determine leg strength and hopping leg stiffness. It was discovered that the half-squat and counter-movement jump were the best predictors of speed over the 0-30m phase and hopping of the last two phases. When it comes to conditioning, specific methods are needed to improve the overall sprint.

uses a much more complex evaluative methodology, for example, accounting for horizontal velocity, contact time and changes in vertical leg length in regard to maximum vertical force. Leg stiffness is used most relevantly to assess running. But it's a little complicated as vertical stiffness can also be an influencer on horizontal speed, as will be identified.

Research shows that each joint in the legs can have a different degree of natural and conditioned stiffness. As we are dealing with human beings and not an inanimate object such as a mechanical spring, there's a neurological dimension that also needs to be factored in—the ability of the central nervous system to react to the forces involved.

Researchers have looked at stiffness across different leg joints—the ankle and knee in sprinters. In one study, 10 male sprinters had their ground-reaction forces, kinematic, and EMG parameters (electrical

activity in muscles) measured when sprinting over a force plate at speeds of 70%, 80%, 90% and 100%.

Results showed that with increased running speed average ankle-joint stiffness was constant but increased in the knee joint. This, the researchers argued, could reflect the role of the Achilles tendon in firing the calf muscles, and that the equivalent knee tendons were less activated by slower speeds. This led them to identify the need to develop greater knee-joint stiffness and vertical stiffness as a means to improve speed (vertical jumps and drop jumps are useful training tools in this respect).

### LONG-TERM TRAINING

Another trial considered the development of leg stiffness over six months of specific training. Nine male athletes performed maximal-effort 60m sprints before and after the completion of six months of winter training. The researchers looked at the sprinters' techniques at peak

velocity and their ground-reaction force (GRF). Sprinting speed was significantly developed through longer step length. In terms of stiffness it was determined that vertical stiffness significantly increased. However, to add some slight confusion in terms of the previous research it was noted that, although knee joint stiffness remained constant, ankle-joint stiffness was significantly developed but leg stiffness was not. They put this down to a respective increase and decrease in ankle plantar flexion (toes down) movement and ankle dorsiflexion (toes up) angle respectively. Interestingly, it's been identified that increased stride length—though potentially increasing sprint speed—does not necessarily reflect a direct increase in leg stiffness or vertical stiffness (see Analysis of Bolt panel above).

### HOW TO IMPROVE STIFFNESS

This is the multi-million dollar question. One more or less constant truth

is that the faster you run, the greater the amount of stiffness across all joints. This is also the case when it comes to hops or drop jumps—i.e., the quickest ground reactions generate superior stiffness. Therefore, sprinting will promote enhanced stiffness in itself. This is a useful consideration for an endurance

athlete (see *Leg Stiffness and Endurance Performance* panel above) in regard to developing increased running economy (RE).

When it comes to using plyometrics to enhance stiffness, as well as emphasising the speed of reaction, jumps should be performed

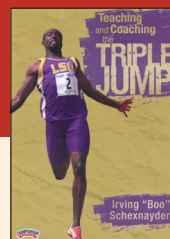
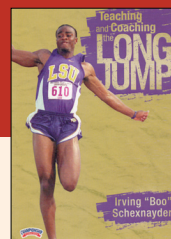
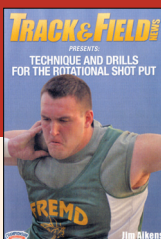
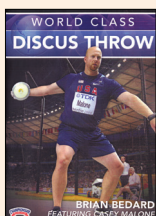
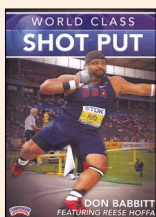
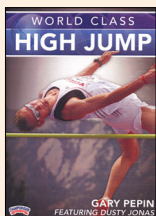
for distance as well as height, and single and multiple ground contacts should be used.

John Shepherd is coach to top UK athletes.  
See [johnshepherdfitness.com](http://johnshepherdfitness.com)

## CLEARANCE SALE All DVDs created by Championship Productions

# WHILE THEY LAST!

**DVDs \$15 each**



### Track & Field News Presents Series

|               |            |         |
|---------------|------------|---------|
| Rotation Shot | Jim Aikens | 93 min. |
|---------------|------------|---------|

### Teaching and Coaching Series

|             |                   |         |
|-------------|-------------------|---------|
| Shot Put    | Scott Cappos      | 42 min. |
| Long Jump   | "Boo" Schexnayder | 30 min. |
| Triple Jump | "Boo" Schexnayder | 35 min. |

### World Class Series

|              |                               |         |
|--------------|-------------------------------|---------|
| Shot Put     | Don Babbitt (w/Reese Hoffa)   | 75 min. |
| High Jump    | Gary Pepin (w/Dusty Jonas)    | 91 min. |
| Discus Throw | Brian Bedard (w/Casey Malone) | 85 min. |

Order by regular mail from Track & Field News, 2570 W. El Camino Real, Suite 220, Mountain View, CA 94040. Phone: 650/948-8188. Add \$5.00 per DVD postage/handling. Send personal check or credit card information (Visa/MC/Amex). [www.trackandfieldnews.com](http://www.trackandfieldnews.com)



# USATF UPDATE ON COVID-19 CONCERNS



Dear Members:

As we navigate these unpredictable and unprecedented times, we hope that you, your families and teammates are safe.

Because the situation with Coronavirus (COVID-19) is rapidly changing, USATF has developed [USATF.org/COVID19](https://www.usatf.org/COVID19) to help communicate updated information to athletes, coaches, athlete representatives, event organizers, volunteer leaders and members. The page will be updated regularly as new information emerges. The website is a supplement to information from the CDC with best practices and information from our COVID-19 Working Group and logistical information from our High Performance department.

Earlier, we announced that all USATF Championships are cancelled for the next 30 days. Also cancelled is the 2020 USATF Masters 10 km Championships set to be held in Dedham, Massachusetts on April 26, 2020. USATF Associations should follow the recommendations of their local health authorities when determining whether to proceed with scheduled events. We encourage each Association to err on the side of safety.

Continue to follow the recommendations and updates from the CDC, including proper hygiene practices.

Be safe as we continue to navigate this uncertainty.



## U.S. CENTER FOR SAFESPORT TRAINING NOW AN ANNUAL REQUIREMENT

In compliance with the U.S. Center for SafeSport, USATF registered coaches (among others) must complete SafeSport training on an annual basis. This means you must have completed either the Core SafeSport Training, or a SafeSport Refresher course within the past 365 days. If you have not yet completed the U.S. Center for SafeSport's Core training on [safesport.org](https://www.usatf.org/safesport/safesport-training), please create an account and complete the training (instructions for doing so can be found at: <https://www.usatf.org/safesport/safesport-training>). This Core SafeSport training is completely free to USATF members using your USATF member number. The Core SafeSport training will take roughly 90 minutes to complete and can be interrupted and completed at any time (it does not have to be completed all in one sitting). A SafeSport Trained PDF certificate will be available for download once you complete the training. Please retain this PDF for your records.

If you already have your *SafeSport Trained* PDF but you completed the training more than one year ago, you will need to complete a SafeSport Refresher Course, available on [safesport.org](https://www.safesport.org) on your Learning Dashboard. If you have completed SafeSport training (either the Core training or a Refresher course) within the past year (365 days), no further action is needed from you at this time, but you must renew your SafeSport training on or before your training lapses one year.

**Please ensure the SafeSport training you have completed is dated within the past 365 days.** Thank you for helping to make USATF a safe environment in which our athletes can train and compete. Please reach out to [safesport@usatf.org](mailto:safesport@usatf.org) with any questions.



# TRACK & FIELD NEWS

[www.trackandfieldnews.com](http://www.trackandfieldnews.com)

SERVING THE TRACK & FIELD

## COMMUNITY SINCE 1948

### TRACK & FIELD NEWS

T&FN is the standard of accuracy and completeness for reporting of U.S. and worldwide track and field athletics. Published monthly. Call 1-800-GET-TRAK (1-800-438-8725) to subscribe or subscribe online: [www.trackandfieldnews.com/subscribe](http://www.trackandfieldnews.com/subscribe).

| Annual Subscription Rates:      | USA   | Canada | Foreign |
|---------------------------------|-------|--------|---------|
| Digital only                    | \$79  | \$79   | \$79    |
| Print only                      | \$79  | \$127  | \$177   |
| Digital + Print                 | \$109 | \$157  | \$207   |
| Premium Archive Digital Only    | \$128 | \$128  | \$128   |
| Premium Archive Digital + Print | \$158 | \$206  | \$256   |

*Print subscriptions include 12 monthly print issues. Etrack weekly results newsletter is included with all digital subscriptions.*

### TRACK COACH (Digital Only) 1 yr subscription — \$19.95

The official technical quarterly of USA Track & Field, *Track Coach* (formerly *Track Technique*) has been the sport's major technical publication since 1960. TC became a digital-only publication in January 2015.

### TOURS

Popular sports tours since 1952. Write for information about tours to the Olympics, Olympic Trials, World Championships, etc.

#### TRACK & FIELD NEWS

2570 W. El Camino Real • Suite 220 • Mountain View, CA 94040 • USA

Phone (650) 948-8188 • Fax (650) 948-9445

<http://www.trackandfieldnews.com> • email: [subs@trackandfieldnews.com](mailto:subs@trackandfieldnews.com)

