# Are you on ARGUS By Dr Carol Austin Photos: Wayne Hayward IARGE P

ost post-holiday magazines will feature a pick-me-up for those who slacked over the holidays, but the Argus training programme we introduced in the last magazine of 2007 promised to help you ride your best Cycle Tour yet... If you were able to follow the first 8 weeks of the training programme, you should be starting to see results! Some of you might well be riding away from your usual training partners on climbs, and finishing stronger at the end of your long rides, while others will have lost some weight. Here we offer the next four weeks of your 12-week buildup to a great Cape Argus Pick 'n Pay Cycle Tour in 2008!

If everything did not exactly go to plan, all is not lost... we can't offer you fad diets, quick fixes, shortcuts, or miracles, and there is no way to catch up on the training you have not done, but there is still a bit of time to reassess your objectives realistically. Some systematic training is always better than an unstructured last-minute flurry of activity, so dig out the first weeks of the programme, and get cycling!

In this issue Ride Mag presents the final 4 weeks of the I2-week training build-up to the Cape Argus Pick 'n Pay Cycle Tour 2008.

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# WORKOUT DESCRIPTIONS

#### **EXPLANATION OF ABBREVIATIONS:**

**RBI** = Rest Between Intervals **RBS** = Rest Between Sets

For Core Training programme refer to www.activeworx.co.za

**INFORMATION: Strength - Core Training** 

## **TRAINING SESSIONS**

The Total Workout Time is described by the Training Session (RB, EB, GB) time e.g. EB 1:30 + Tempo 3 x 10min with 10min RBI means that the total workout time is 1hr30min inclusive of three 10minute Tempo intervals which will be done within this time.

#### **Recovery Bike (RB)**

Duration: 45min - 1 hour Terrain: Flat to rolling Effort: Very easy, RPE 1-2, able to speak normally Cadence: Very light gear, 75-95rpm

#### **Endurance Bike (EB)**

Duration: 1 - 4 hours Terrain: Flat to rolling Effort: Easy to moderate pace, RPE 4-5, able to speak normally Cadence: 80-100rpm on flat, 70-85rpm on climbs

#### Group Ride (GB)

Duration: 1½ - 4 hours Terrain: Flat to rolling Effort: From Easy to Hard, RPE 4-6, able to speak normally for most parts - some hard efforts Cadence: 80-100rpm on flat, 70-85rpm on climb

#### Pre-Race Warm-up

REVOLUTIONS

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Terrain: Flat or on an indoor trainer Description: Start with 20min of easy EB riding at 85-100rpm. Then complete the following routine

Then complete the following routine: 5min Tempo at 80-85rpm, 5min RB, 3 x 2min SS with 2min RBI, 3 x 20sec SI at 100-110rpm with 20sec RBI. Finish up your remaining session time with easy RB. You should finish up this session feeling fired up and ready to race (not tired).

**Effort:** Varies from easy to maximal efforts, RPE 4-10+



# SPECIFIC INTERVALS

Specific intervals are completed within the time given for the training session e.g. EB  $1:30 + \text{Tempo } 3 \times 10 \text{min}$  with 10 min RBI means that the total workout time is 1hr30 min inclusive of three 10-minute Tempo intervals which will be done within this time.

#### Turbo Pedal (TP)

Terrain: Flat to slight downhill Description: In a light easy gear, spin at a high cadence while maintaining a low-moderate heart rate. Focus on pedalling smoothly keeping your cadence high (110-120rpm) without bouncing in the saddle.

Effort: Moderate, RPE 5-6, just able to speak in sentences

#### Strength Pedal (SP)

**Terrain:** Long, gradual hill 4-6% grade

**Description:** In a heavy gear, pedal steadily at a low cadence (50-55rpm) while maintaining a moderate heart rate. Focus on pedalling smoothly through the entire pedal stroke. You should feel like you're riding through treacle! This on-the-bike strength training interval will improve your climbing strength and performance. **Effort:** Moderate, RPE 5-6, just able to speak in sentences

#### Tempo (T)

**Terrain:** Flat to uphill or indoor trainer

**Description:** Ride at a pace that is challenging but not hard, focus on maintaining a consistent effort and rhythm for the full interval duration. **Effort:** Strong effort, RPE 6, able to speak in phrases

#### **Steady States (SS)**

Terrain: Flat or indoor trainer Description: A challenging interval just below your lactate threshold. Focus on maintaining the intensity of the effort steady for the entire duration of the interval. Effort: Strong-Very strong effort, RPE 6.5-7.5, able to speak in short phrases

#### Tempo Climb (T-Climb)

**Terrain:** Long, gradual hill 4-6% grade

**Description:** A challenging interval just below your climbing lactate threshold. Focus on maintaining a consistent effort and rhythm for the full interval duration.

**Effort:** Strong-Very strong effort, RPE 6.5-7.5, able to speak in short phrases

#### Threshold Climb (TC)

**Terrain:** On a steady climb, 4-8% gradient

**Description:** A challenging interval at your climbing lactate threshold. Focus on maintaining the intensity of the effort steadily for the entire duration of the interval. **Effort:** Hard - Very hard, RPE 8-9, only able to speak in words

#### Hill Accelerations (HA)

**Terrain:** On a steady climb, 4-8% gradient

**Description:** A challenging interval at and above your climbing lactate threshold. Focus on maintaining the intensity of the effort steady for the entire duration of the interval. As each 1½ min of your interval time passes accelerate for 30 seconds, thereby simulating repeated attacks on the climb.

Effort: Hard-Very hard, RPE 8-9, only able to speak in words

#### **Power Intervals (PI)**

Terrain: Flat or indoor trainer Description: An intense maximal effort at a high cadence. Use the first minute to build up to the desired intensity, cadence and speed. Then hammer down for the remainder of the interval. Focus on maintaining your prescribed cadence for the entire interval. Effort: Extremely hard-Maximal, RPE >10-10+, not able to speak

#### Speed Intervals (SI) Terrain: Flat to slight downhill

Description: Repeated maximal speed and intensity intervals. Focus on accelerating quickly, and then maintaining your power and speed for the duration of the interval. Effort: Extremely hard - Maximal, RPE >10-10+, not able to speak

#### **Sprint Intervals (Sprints)**

**Terrain:** Flat to slight downhill, solo or with a lead out **Description:** Get up to speed (+35km/hr) in the drops, select your sprint gear (shift up by at least 2 gears), jump out of the saddle to accelerate and as soon as you're on top of the gear, sit and hammer down in an aerodynamic position with maximal effort through to the finish line. Maintain a high cadence (+100rpm) and good form throughout.

**Effort:** Extremely hard - Maximal, RPE >10-10+, not able to speak

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ride mag Year 11/03 (February'08)

# RATING OF PERCEIVED EXERTION (RPE)

The intensity of your training session is described according to the following Rating of Perceived Exertion (RPE) Scale. Your RPE should reflect how strenuous the exercise feels to you, combining all sensations and feelings of physical stress, effort and fatigue. Do not concern yourself with any one factor such as leg pain or shortness of breath, but try to focus on your total feeling of exertion. For each workout an RPE is given. Before your training session, refer to this scale so that you're reminded of the intensity of the training session and specific intervals. While training, assess your feeling of exertion as honestly as possible without thinking about what the actual physical load is. Your own feeling of effort and exersion is important, not how it compares to other people's.



Gunner Borg's Ten Point Category-Ratio Scale of Perceived Exertion

PERCEIVED EXERTION SCORE	DESCRIPTION						
0	Nothing at all						RM = RECOVERY BIKE
0.5	Extremely weak						EB = ENDURANCE BIKE
I	Very weak						GR = GROUP RIDE
2	Weak (light)	RB					SP = STRENGTH PEDAL
3	Moderate						TP = TURBO PEDAL
4	Somewhat Strong	EB	GB,				T = TEMPO
5	Strong (Heavy)						TEMPO-C = TEMPO CLIMB
6			TP, SP	т	SS,		S = STEADY STATES
7	Very Strong			j	Tempo-C		TC = THRESHOLD CLIMB
8							HA = HILL ACCELERATIONS
9						TC, HA	PI = POWER INTERVALS
10	Extremely Strong					PI, SI,	SI = SPEED INTERVALS
*	Maximal					Sprints	SPRINTS = SPRINT INTERVA



# **SUB-3HR 100KM RACE**

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY	SATURDAY	SUNDAY
	FEB 11	12	13	14	15	16	17
WEEK 9	REST DAY	Hard GB 1:30 or EB 1:30 with 20min Tempo at 80- 85rpm and 2 sets of 3 x 2min PI at 95-105rpm with 2min RBI and 10min RBS	EB 1:00 + 15min Core Training	EB 1:30 with 4 x 4 min HA at 80-95rpm with 6min RBI	RB 45min + 15min Core Training	1:15 Pre-race Warm-up Session	Ride for Sight 105km or Hard GB 3:30
	18	19	20	21	22	23	24
WEEK 10	REST DAY	EB 1:30 with 4 x 6min T-Climbs at 85-95rpm with 8min RBI	Hard GB 1:30 or EB 1:30 with 20min Tempo at 80- 85rpm and 2 sets of 3 x 2min PI at 95-105rpm with 2min RBI and 10min RBS	EB 1:30 Easy!	RB 45min + 15min Core Training	1:15 Pre-race Warm-up Session	Carnival City 100km or Hard GB 3:30
	25	26	27	28	29	MAR 1	2
WEEK 11	REST DAY + Sports				RB 45min + 15min Core		Tour de Soweto 50km
	Massage.	EB 1:00, Easy!	REST DAY	EB 1:00, Easy!	Training	Easy GB 2:30	or EB 1:30
	3	4	5	6	7	8	9
WEEK 12	REST DAY. Time to wake the legs up for your sub 3-hour Argus!	Hard GB 1:30 or EB 1:30 with 15min Tempo at 80-90rpm and 3 sets of 4 x 20sec SI at 100- 110rpm with 30sec RBI	EB 1:00 + 15min Core Training	EB 1:30 with 15min Tempo and 3 x 4 min HA with 5min RBI and 2 x 15sec Sprints with at least 5min RBI	REST DAY	1:15 Pre-race Warm-up Session	Argus Cycle Tour 109km

### **SUB-3 PROGRAMME**

That golden SUB-3 has been eluding you for the past couple of years, despite your best training efforts. You've managed a sub-3:30 off your training and racing, and have proficient bike-handling and group racing skills. You have a mid to elite level road bike (weighs < 9kg), and you're close-to your healthy weight for your height, build and age. You belong to a competitive cycle club. This programme will help you to achieve a sub-3 if:

- You have a reasonable start seeding i.e. Group F or better. As scientists we have to consider the statistics and offer the odd reality check. Take a look on the cycle tour website at the past 3 year's times and you'll understand. We're not saying that you can't do a SUB-3 if you have a lesser seeding...it's simply that the odds and heavy Argus traffic are stacked against you so you'll have to try harder.
- You're committed to giving it your best shot, and that means training up to 6 times a week and up to 12 hours per week.

5 CONTINUE REVOLUTIONS

You already own a mid range bike computer/heart rate monitor, and are considering investing in a power meter so that you can experience the benefits of "Training with Power".



# **SUB-4HR 100KM RACE**

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY	SATURDAY	SUNDAY
	FEB 11	12	13	14	15	16	17
WEEK 9	REST DAY	EB 1:30 with 15min Tempo at 80-85rpm and 4 x 5min TC at 80-95rpm with 4min RBI	EB 1:00 + 15min Core Training	EB 1:30 with 2 x 5min TP at 105-120rpm with 5min RBI and 3 x 8min SS at 90-100rpm with 5min RBI	REST DAY	1:15 Pre-race Warm-up Session + 15min Core Training	Ride for Sight 105km
	18	19	20	21	22	23	24
WEEK 10	REST DAY	EB 1:30 with 1 x 15min Tempo at 80-85rpm and 2 sets of 3x1min PI at 100-110 rpm with 2min RBI and 5min RBS	EB 1:00 + 15min Core Training	EB 1:30 with 2 x 5min SP at 50-55rpm with 5min RBI and 4x6min T- Climb at 90-100rpm with 5min RBI	REST DAY	1:15 Pre-race Warm-up Session + 15min Core Training	Carnival City 100km or Moderate GB 4:00 on Hilly Route
	25	26	27	28	29	MAR 1	2
WEEK 11	REST DAY. This is your recovery week.	EB 1:15 EASY!!!	REST DAY	EB 1:15 EASY!!!	REST DAY	1:15 Pre-race Warm-up Session + 15min Core Training	Tour de Soweto 50km
	3	4	5	6	7	8	9
WEEK 12	REST DAY. Time to wake the legs up for your sub 4-hour Argus!	EB 1:15 with 2 x 6min SS at 90-100rpm with 6min RBI and 2 sets of 3 x 30sec SI at 100-110rpm with 30sec RBI and 5min RBS	EB 1:00 + 15min Core Training	EB 1:15 with 2 x 6min SS at 90-100rpm with 6min RBI and 2 sets of 3 x 30sec SI at 100-110rpm with 30sec RBI and 5min RBS	REST DAY	1:15 Pre-race Warm-up Session + 15min Core Training	Argus Cycle Tour 109km

### **SUB-4 PROGRAMME**

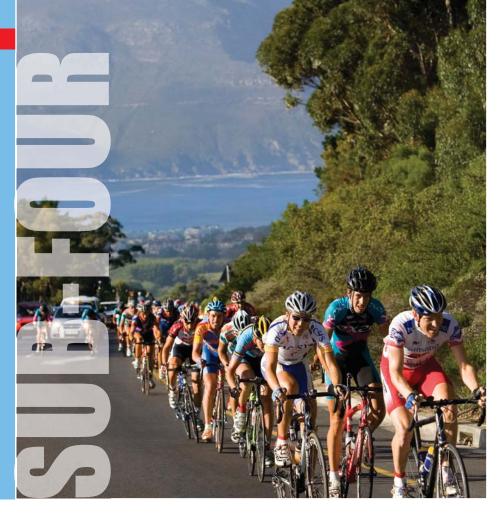
In years past you've raced off your natural talent. You usually wash the year's accumulated dust off your bike and "saddle up" on January 2 when you're ready to trim off some of those excess festive kilos and address your new year's resolutions. This year you've resolved to explore your real talent – to see what you can achieve with consistent training and a scientific approach. Your colleagues, friends and/or family have managed to improve their times so the challenge is on. You know that you can do better! You've invested in an entry-to-mid level road bike or hybrid and have joined a cycling club so that you can participate in their weekend group rides.

This programme will get you on track to achieve a sub-4 if:

- You're ready to commit to 4-5 training sessions per week, with longer rides on the weekends.
- You're planning to participate in several races leading up to the Argus; to gain group riding experience, improve your bike handling skills, race nutrition and pacing.

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 You're prepared to invest in or already own a cadence meter or entry level bike computer /monitor (key parameters: cadence, heart rate, speed).



## SHIMANO



# CAUTION

Before embarking on any strenuous exercise programme (like this one) or participating in a strenuous athletic event (like the Argus) it is advisable to visit your doctor for a full physical examination and medical clearance to proceed.

## **5 Rules of athletic success**

As a coach I learn from my athletes daily. Whether you're an amateur or professional endurance athlete, basic rules apply:

- There is no such thing as luck and hope. In sports performance it's all about goal setting, planning, and the blood-sweat-and-tears of consistent effort.
- Every detail counts. Don't ignore or neglect any "slow punctures" in your bike, health and life. They won't go away and will be there to bite you – when it matters most.
- 3. Physical development, skills, competence, mental fortitude and racing experience are cumulative. Be patient and persistent. Age is more in the mind and soul than the body when it comes to endurance sports!
- 4. Dream BIG. Shoot HIGH. You're CLOSER than you think!
- 5. There's a great deal of ART to the SCIENCE of Athletic Performance. Athletes are composite: body, mind and soul!

### YOUR ONLINE RIDE ARGUS TRAINING Programme

Have you ever wondered what it's like to have an e-coach? Or to train like the Pros?

ACTIVEWORX is offering special rates on all of these 12-week Ride Argus training programmes through an online coaching system. Each athlete member will have a personal login and individualised heart rate and power zones (if they own a power meter).

Instead of referring back to the RIDE Mag daily, they will receive their training programme in advance via email, and will be able to track their progress through their fully interactive personal log book.

For more information or to sign up go to www.activeworx.co.za



ww.shimano.com





# **SUB-5HR 100KM RACE**

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY	SATURDAY	SUNDAY
6	FEB 11	12	13	14	15	16	17 Ride for Sight
WEEK	REST DAY	EB 1:30 + 2 x 5min TP at 110-120rpm with 5min RBI and 3 x 6 min SS at 90-100pm with 6min RBI	RB 0:45 + 15min Core Training	EB 1:30 with 2 x 5min SP at 50-55rpm with 5min RBI and 3 x 6min T-Climb at 85-90rpm	REST DAY	1:15 Pre-race Warm-up Session + 15min Core Training	105km or GB 3:30 on Hilly Route
	18	19	20	21	22	23	24
WEEK 10	REST DAY	EB 1:30 Easy!	RB 0:45 + 15min Core Training	EB 1:30 with 2 x 6min SP at 50-55rpm with 6min RBI and 4 x 6min T-Climb at 85-90rpm with 6min RBI	REST DAY	GB 2:30 + 15min Core Training	Carnival City 100km or GB 2:30
	25	26	27	28	29	MAR 1	2
WEEK 11	REST DAY	EB 1:30 + 2 x 5min TP at 110-120rpm with 5min RBI and 4 x 6 min SS at 90-100pm with 6min RBI	RB 0:45 + 15min Core Training	EB 1:30 with 2 x 6min SP at 50-55rpm with 6min RBI and 4 x 6min T-Climb at 85-90rpm with 6min RBI	REST DAY	Easy GB 1:30 + Core Training	Tour de Soweto 50km or EB 1:30
	3	4	5	6	7	8	9
WEEK 12	REST DAY. This is your recovery and race week. Take it easy and prepare your equipment and sports nutrition!	EB 1:00	REST DAY	EB 1:00 with 3 x 5min Tempo at 90-100rpm with 5min RBI	REST DAY	1:15 Pre-race Warm-up Session + 15min Core Training	Argus Cycle Tour 109km

### **FIRST TIME/SUB-5**

You're just getting into the sport of cycling, or perhaps you're more interested in the journey than the race! You have not been training regularly (if at all) and you'd like to build-up your training and bike skills gradually so that you are able to finish the Argus comfortably. You plan to ride on a mountain bike, hybrid or entry-level road bike. You'd like to experience a structured training programme, and look forward to the additional benefits of improved fitness and fat loss.

This programme is right for you if:

- You're ready to commit to 4 training sessions per week, with longer rides on the weekends.
- You'd like to do some races leading up to the Argus; as preparation, to gain group riding experience, improve your bike handling skills, race nutrition and pacing.
- You're prepared to invest in a cadence meter





# It's not <mark>AL</mark> about the TRAINING PROGRAMME

Cycling is an every-man/woman sport. Young/mature, skinny/muscular, tall/short there's a place for us all. While pure genetic talent is a key determinant of performance, there are many other factors which influence race day results. From bike fit to sports nutrition, racing tactics to mental skills there are many ways in which you can improve. Top performers in business and sport alike understand and respect the details and importance of making every second and opportunity (for improvement) count!

So while you're squaring up to start your 2008 Argus training programme in early December take some time out to consider the various factors that may be holding you back. When you've identified your top 3 opportunities for improvement you're ready to look for the help you need.

World class professional services, resources and information (books etc.) are available throughout South Africa. So surf the internet, chat to your friends, your cycling club, your cycling heroes (aka the Pros), re-read past copies of your favourite cycling magazines, speak to your favourite bike shop wrench, watch the sports programmes on TV... you'll be amazed at the availability of knowledge and practical solutions.

By taking a holistic approach to performance enhancement you will experience rapid and significant improvements. With a sciencebased training approach "results are typical" ...and in just 3 months you'll be positioned to achieve your Argus goals!

#### Photo: Karin Schermbrucker



#### About the Author

Dr Carol Austin is a medical doctor with a passion for endurance sports. She is a certified USACycling coach and was a Senior Coach with Carmichael Training Systems for several years. In late 2004 she founded ACTIVEWORX, a South African company which offers worldclass endurance sports performance services and products.

As a coach, she has a proven track record across a broad range of athletes and sports including the likes of Yolande Speedy (2007 African/South African XC and Marathon MTB Champion), Ben Melt Swanepoel (2007 African XC MTB Champion), Alex Pavlov (2005 African TT Champion), Ian McLeod (francaise des Jeux), Ronel van Wyk (2007 Road, Time Trial and Track Champion) and others.

Carol has recently been appointed High Performance Director for Triathlon South Africa (TSA) and is working with the TSA Elite-Olympic Team on their road to the Beijing Olympics 2008.

For more information go to www.activeworx.co.za

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ENERGY



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