



Leigh Cunningham and Mark Andrews make diving history
INSET: Divers on the descent

Two Brits in Egypt World's Deepest Wreck Dive *Yolanda December 2005*

Text by Mark Andrews
Photos by Adam Butler

I checked in at Gatwick Airport on Saturday, the third of December, with three very large dive bags containing all the necessary equipment to make a descent, hopefully, to the deepest wreck ever dived.

Astraeus flights and Red Sea.com were more than helpful with this project and made sure that my check in went as smoothly as possible. Considering that one of the bags contained a Farallon ride-on scooter, this was a great relief.

I arrived at Sharm El Sheikh airport to be met by my deep diving buddy, Leigh Cunningham, who drove me to my hotel. Leigh was describing to me how the last two weeks prior to my arrival had seen perfect conditions for diving Yolanda reef with very little wind and smooth seas. Of course, with the

luck we had been having with this project, it was bound to all change.

I cast my mind back to May when we started the project. All went well until I received a dose of Pharaoh's revenge and spent the last part of the week wrapped up in bed while Leigh discovered the bow of the wreck in 145m.

After a good night's sleep, I travelled down to Trafco jetty to meet the dive boat supplied for the project by Seamus and Anna of Colona Dive Centre. They had also supplied the boat last time.

The team was already aboard busy preparing equipment and making ready for Leigh and myself. The team consisted of multi-national technical divers from Sharm El Sheikh and Dahab. Most of them I had worked with in the past and some were new to me. All shared a common inter-

est and a passion for technical diving. It would assure that this week would be a success.

The weather was holding out for us, and we steamed out into flat blue seas with little to no wind.

The first day was spent at a local dive site making the deep dive rigs and ensuring that all the equipment was working as it should.

I decided to use my triple

300-bar Worthington carbon/steel combination cylinders for this dive. This would allow me to wear one less cylinder than Leigh and offer a less dramatic profile in the water.

Leigh decided to wear his trademark dive rig of twin twenty litre cylinders with a twelve litre strapped to either side and two fifteen litre tanks as stages, thus making a six-tank configuration. The problem I had with



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LEFT TO RIGHT: View from above of Leigh preparing himself and his gear for the dive; Ras Mohammad can be seen on the horizon behind the team on the *Colona*; Sunglasses reflect a confident Leigh; The Plunge

my rig was that there was nowhere in the Sinai that had a 300-bar compressor system... That is, until now.

Chad Clarke, a familiar face in Sharm, has opened an all new pumping and gas blending station next to Trafco jetty (Ocean Tec) and agreed especially for this project to install a 300-bar system. How's that for service? You are a star Chad!

Leigh and myself spent the first day

tinkering with the dive rigs. The team took the opportunity to study the rigs and fully familiarise themselves with their operation. They were going to be responsible for ensuring that we had all the right equipment in the right place prior to each dive. Later in the day, we made a 100m dive to ensure all was well—both with us and the rigs.

The second day, we were out to the dive site itself and made another 100m

dive. This time, we had the full dive team in the water simulating the big dive itself.

Apart from diving to over 200m, the hardest part of this dive was that it was all done with no shot lines—free descent and free ascent being the order of the day. The safety divers needed to be experienced in blue water diving with no visual reference of lines or reefs.

Both Leigh and I decided not to have safety divers deeper than 30m on the big dive itself due to the fact that we would be carrying all necessary gas for the entire dive and would prefer to be alone during the busier parts of the ascent, which required great concentration of ascent speed and gas switches. The idea was to deploy DSMB's at 30m. Each of us would have two support divers

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descend down the line to greet us with spare gas, if needed, and in-water hydration packs.

We made an additional day's diving on the site again to 100m with the whole team. Everything was going very well. The weather was holding, the team was exceptional, and Leigh and I were both in great condition for

the dive.

Tuesday the 6th, after the last air dive, saw us in the gas blending station, Ocean Tec at Trafco, preparing for the first mixed gas dive the following morning.

We hit a major problem within minutes of starting. Although we had a 300-bar compressor, we had overlooked the fact that we

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needed a 300-bar decanting whip for the blending panel.

The mood changed as we tried everything we could to mate various parts lying around the centre to make a workable whip. Just as despair was setting in, Chad came to the rescue and called a local engineer who came down to the centre. We showed him a 300-bar spin tube and the high pressure decanting hose and simply stated that we needed "this bit to fit onto this bit". This was met with a little scratch of the head followed by "no problem, two hours". It was 8pm in the evening. Can you imagine this situation in the UK?

We decided to have a break and went to dinner. An hour later, we received a call from Chad saying that the part was there. We paid the bill and hurried back to the centre. I must admit, I had my doubts, as the fitting needed an odd coupling to ensure a good fit. We put it together, and it worked a treat—not even a slight leak.

The following morning, we headed out to "Yolanda Reef". Again the weather and sea were perfect. This time, we had left the dive plan with Doctors Adel and Ahmed at the Sharm Hyperbaric facility that would follow our progress and support the project with medical assistance. We agreed in return for this service that we would visit the chamber after each dive and undergo some tests for their studies.



dive to 150m to relocate the bow of the wreck and plot the position with GPS to make ready for the big dive. We already had a good idea where we needed to drop, and Vern, our GPS man, was ready when we dropped off the back of the boat. Snorkelers entered the water and checked our dive rigs for leaks. Once completed, we descended into the blue on our 45/12 travel/intermediate decompression gas. At 10m, we gave each other the gas switch signal and switched to our back gas of 9/57. We both settled into



CLOCKWISE FROM TOP LEFT:
Leigh cruises over Yolanda's cargo of porcelain toilets

Leigh's bumper sticker message, 'Follow Me'

Mark and Leigh confer at a station check point

A support diver arrives with the Farallon scooter



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the descent and enjoyed the ride.

We reached 100m, and there was still no sign of the reef wall— just dark water all around, I turned on my Metal Sub 200W HID and pointed it in all directions, but there was nothing. Then at 120m, the light picked up the funnel of the wreck lying off to one side on the steep reef wall.

We had landed about 50m to the right of the main wreckage. We made the swim across and down to 150m to meet the bow of the wreck. The Metal Sub lit up the wreckage like it was in a football stadium, and we could clearly see the debris scattered all around the steep reef wall.

I shone my dive light down the length of the wreck and watched as she seemed to go on forever down the steep slope. We had no idea how far down she would reach.

We were both amazed at how entrenched in sand she had become. The bow was merely a few feet proud of the sea bed being covered

in years of sand fall delivered from the strong currents that run between the two reef plates high above the wreck.

Our bottom time soon ran out. We both gave the up signal and waved goodbye to the wreck. As we ascended, the reef quickly disappeared from view and we were back in the blue.

We reached our first gas switch depth at 75m (17/25), and signalled each other to assure we both made the switch. Ascending in the blue can give some divers severe vertigo and should not be contemplated without a good deal of experience in shallow water first. It requires a lot of concentration and discipline, and you can easily find yourself in violation of ascent speeds and run times.

At 30m, we made our next switch (45/12) and deployed our DSMBs to show the surface support our position in the water.

As mentioned, the currents can be very strong here, and we are never sure just where we will be when we deploy the DSMBs. A lookout is always scanning the sea from the dive boat at the time we state on the dive plan to deploy.

Within 5 minutes, we were joined by two safety divers each. One carried the Farallon scooter to help us get back to the reef wall for a more pleasant decompression phase. The safety team kept a careful eye on us as we made our final gas switch to 80% Nitrox.

After just over two hours in the water, we reached the



ABOVE: Mark and Leigh float weightless under the sun

RIGHT: The team of safety support divers meet up with Mark and Leigh on the multi-stage ascent to the surface

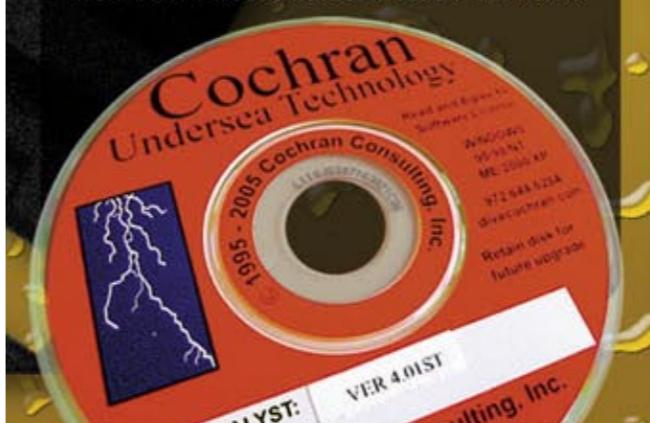
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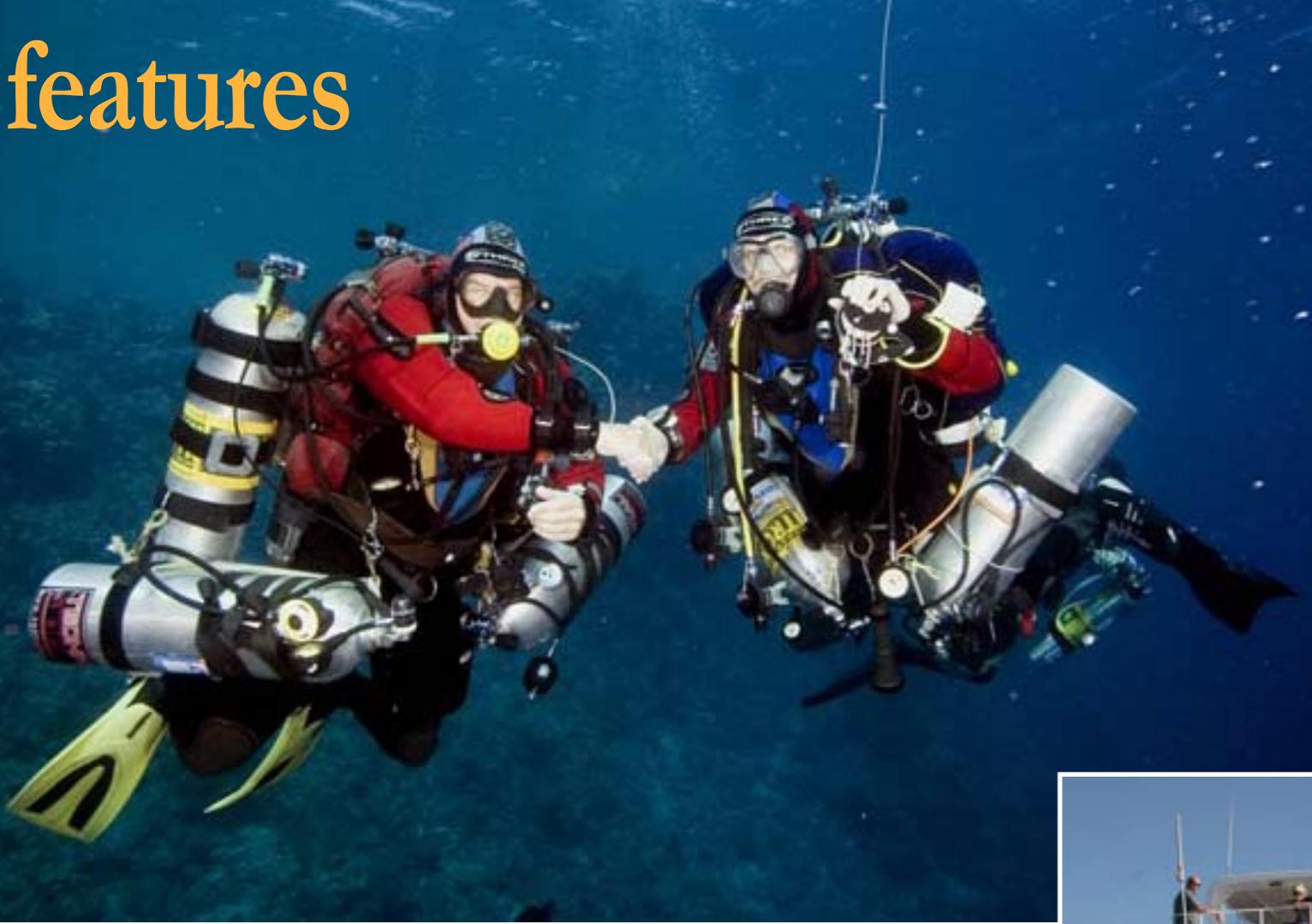
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surface and were helped back to the dive boat *Colona*.

Upon reaching Trafco jetty, we left the team and went over to see Dr Adel and Ahmed in the Sharm Hyperbaric facility, so that they could run some tests. They had a new machine called a *slit scanner* that can detect minute bubble formation in the tear film on the diver's eyes. We were both given a clean bill of health and returned to Ocean Tec blending station to give a hand pumping all the gas for the big dive on Friday.

Thursday offered a chance to relax a little, and we spent the day on the *Colona* dive boat tinkering with the dive rigs and analysing all the gas mixes. We made a final dive plan and briefed the team to each person's responsibilities.

Friday morning saw yet another perfect day with the sun shining brightly and the sea barely rippling. As we arrived at the dive site, the search and rescue team arrived and moored up alongside the *Colona* dive boat. These guys offered us a fantastic service and a speedy evacuation should the worst happen.

Once prepared, we positioned the dive boat over what we believed to be the correct position based on the previous 150m dive. The horn sounded, and we dropped into the water. One of the safety divers performed a quick but thorough leak check on our dive rigs. We signalled each other to descend and slipped below the calm blue water.

We descended the initial 20m on our travel/lean deco mix of 52/15 before signalling each

other to switch to our bottom mix of 7/66. Once switched, we relaxed and descend-

ed at a steady 50m per minute until reaching 120m where we slowed to 30m. This reduction in speed helps lessen the risk of high pressure nervous syndrome (HPNS) bought on by rapid pressurisation of helium (fast descent).

The drop was perfect. The bow of the wreck came into view at 130m, and we descended onto the wreck itself slowly swimming

Safety divers watch and support Leigh carefully on his return to the surface

Leigh and Mark shake hands over the success of reaching the goal
INSET: The team aboard the *Colona*



down along the length of its remains. As I reached 195m, a large bang went off behind my left ear, and my dry suit inflator stopped working. I came to a halt at 205m as measured on our dive computers, a Suunto D9 and a Nitek 3.

As we levelled, we could see that we were just under the stern of the wreck, and that the ship was perched on a ledge roughly 40m wide. Beyond this, a vertical wall descended into the abyss. The wreck had slid down the reef walls and slammed into this small ledge stern first. The rest of the wreck

crumpled under the force. There she rests to this day slowly filling with sand.

As we swam under the stern my pressure gauge imploded

on my intermediate Trimix (16/43). Luckily no leaks occurred, and it just filled with water. One of Leigh's computers imploded squashing the LCD screen (Vytec).

We finished the bottom time by swimming up the other side of the wreck and surveyed all the scattered wreckage that lay around the site. We gave each other the up signal after a bottom time on the wreck of 5.5 minutes and slowly rose back into the dark blue water. As we did so, we got a fantastic view of the wreck.

During the initial ascent, we prepared our intermediate Trimix (16/43) for the gas switch, but my regulator was not responding. I tried to purge but had no response. I maintained a steady 10m per minute ascent rate as I mulled over the thought of having to miss all my deep stops and ascend to the point at which I could switch to my lean Trimix decompression gas. This was not a good option and would almost certainly result in a long stint in the chamber.



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LEIGH AND MARK WOULD LIKE TO THANK THE FOLLOWING PEOPLE:

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RESCUE BOAT
 OSSAMA AND TEAM

CELEBRATION PARTY (Thanks guys)
CHARLEY AND MONTY (TAVERN BAR)

DIVE EQUIPMENT SPECIFICS:

MARK
TRIPPLE SET OF 3 X 12L 300 BAR CYLINDERS
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LEIGH
TWIN 20L 232 BAR CYLINDERS
2 X 12L 232 BAR
2 X 15L 232 BAR

Mark Andrews and Leigh Cunningham are both Instructor trainers for the Professional Scuba Association and teach a range of technical diving in the Red Sea. They can be contacted at:

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We had plenty of spare gas on the dive boat, but this was of no help as I ascended toward the gas switch. As I approached 100m, I again purged the regulator, and to my amazement, a little air escaped from the mouth-piece followed by a loud gushing sound. Then, everything was operational again. I safely made my gas switch at 84m along with Leigh and enjoyed a large sigh of relief.

We both ascended following the decompression schedule precisely and deployed our DSMBs at the forty-second minute as planned from a depth of 30m. We were soon joined by the safety divers who were eager to know if the dive was a success. A big OK and large smiles from Leigh and myself confirmed the successful mission.

We ascended to 27m for the next gas switch of 50/15, which could not come soon enough

for me, as the pressure gauge on my 16/43 was still reading 300-bar after the implosion.

The Farallon scooter arrived, and we slowly made our way back towards the reef wall to continue the decompression. We made our final switch onto our 80% Nitrox and completed the 205 minutes of decompression with no further problems.

Once back on the dive boat, we compared broken bits of kit and discussed the truly awesome dive we had just undertaken. The boat was alive with happy smiling faces and everyone shaking hands. Louise, one of the photographers, made us a chocolate cake to celebrate the dive, and all the team and crew tucked in for the return to shore.

Once at the jetty, Leigh and I went back over to the chamber



for further tests and were again given a clean bill of health.

Back at Ocean Tec, we rejoined the dive team for the official team photographs and thanked everyone for their support.

The team is often overlooked in these projects, but Leigh and I are honoured to have worked with the finest support team that we could ever hope to have. We cannot thank them enough. Without them, the success of this dive could not have been achieved. ■

ABOVE: Mark and Leigh celebrate with the team

BETWEEN: The cake the photographer, Louise, made for the team

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