free flight

The Journal of the SOARING ASSOCIATION OF CANADA Le Journal de L'ASSOCIATION CANADIENNE DE VOL À VOILE Mar/Apr 1981

THE GREAT ADVENTURE

We had not planned to reprint more from "Australian Gliding", as we are currently using their series on Atmospheric Convection as they become available. This extraordinary story, however, demands exposure in the northern hemisphere, so here goes... editor.

ROMANIA to AUSTRALIA by MOTOR GLIDER

by Bill Schoon

It was Thursday May 8th, 1980 and at last we were ready to depart from Brasov in Romania, on our flight to Essendon, Australia by motor glider. We were to cover the distance of 11,292 nautical miles (21,000 km) in 146 hours and 5 minutes actual flying time, there-by averaging 77 knots (143 kph). Our route would take us over almost every type of terrain, from wide green valleys to fierce rugged snow capped mountains, fertile flood plains, several different historic seas, deserts and waste lands so eroded and forbidding as to make us wonder if we were still on planet Earth. Through sandstorms and monsoons, across India to the Himalayas, down the sacred Ganges, along the Chindwin and Irrawaddy of Burma, past the fascinating myriad of Islands of the Mergui Archipelago, through Malaysia and Singapore, then to Indonesia with its monstrous chain of volcanos, many over 2 miles high, finally reaching Timor and then Australia. The weather was to vary from zero to well over 47° C, winds from calm to gale force, visibility from nil to 50 miles. We were also to encounter a phenomenon which we termed a 'blue-out'- similar to a 'white-out' at the poles, with sea and the sky blending into one indistinguishable mass, absolutely no horizon and only the sun to tell us right side up.

Why did we undertake this venture? Bill Riley, the importer of these machines, had been quoted \$14,000 as the shipping cost for 3 motor gliders - so why not fly them out ourselves? By doing so we could have a working holiday, see many interesting sights, and prove the reliability of this type of aircraft.

The pilots would be Bill Riley, Bert Persson and myself. Bill would be our leader — he served on Sunderland flying boats in the RAAF during the war, then as an electronic engineer. He has devoted his talents to promoting the sport of gliding, his ability in this field being well known, as at Tocumwal in southern NSW, he established a most comprehensive gliding complex with Riley Aeronautics, Sportavia Soaring Centre, and glider repair and overhaul services.

Bert is Swedish by nationality but Australian by adoption having been many years at Alice Springs as an Aeronautical Engineer. He holds several gliding records and as an expert aerobatic pilot, he was the star of our award winning film 'The Quiet Challenge' filmed at Tocumwal by the ABC 'Big Country' team.

I also served in the RAAF, on Fighters, Boomerangs, Spitfires and Mustangs. After the War with John Gray and Geoff Williams, I kept my hand in for many years with the 'Cherokee Eagles' formation display team. Fire spotting and control for the Country Fire Authority as well as gliding instructing maintained my interest in aviation.

Now to our aircraft. IS28M2 is the official designation. IS the initials of designer Joseph Silimon, the 28 signifies the 28th production model, while the M2 indicates it is a motor glider 2-seater with side-by side-seating. It is all-metal using IS28 glider components, a wing span of 17 metres, T-tail, retractable dual undercarriage, both positive and negative flap, air brakes, and dual control. The power plant is a 1700 cc Volkswagen-Limbach which at 3600 revs delivers 68 hp, fitted with a 3-position Hoffman propeller, fine for takeoff, course for cruise and fully feathered for glide. Glide angle on the order of 1 in 25, an AUW of 750 kg, normal fuel 40 litres of either 100 octane avgas or premium gas, using about 12 litres per hour at 2800 revs for a respectable 81 knots.

Manufactured by 'Intreprinderia de Constructii Aeronautice', ICA for short, the workmanship is first class. During the war the Germans used the facilities to produce ME109s. Now the Romanians, apart from building gliders, also manufacture under licence French military helicopters and British twin-engined aircraft. The wing is exceptionally strong having already been subjected to over 200,000 hours of fatigue testing without problems. The air foil is by Wortmann.

For our journey the second seat had been removed and an auxiliary 100 litre fuel tank substituted, this gave us 140 litres with an endurance of 11 hours. Emergency gear - dinghy, flotation type beacon, water, rations and first aid were stowed between the rudder pedals and the tank, with the second stick having been removed. When we added our huge number of charts and maps, navigation gear, supplements, spare oil, tools and tie down gear, there was little room for our personal luggage, camera or souvenirs. We wore our Mae Wests, and stuffed our soft luggage behind our heads making sure to leave a tunnel to the fuel selector. Behind our seats we had portable oxygen. We proposed to fly around Mt Everest. My canteen stood on the floor behind the undercarriage lever. Our pilot relief system was ordinary hot water bottles. Every item and each machine was carefully weighed by the ICA crew, but with full fuel, I must admit we cheated a little and were about 15 percent over weight but well within the C of G limits.

Each aircraft was fitted with a VOR, ADF and 2 radios, one being short range for inter-aircraft communication. There would be no blind flying instruments as this was to be a VFR flight. Australian registrations, VH-SSQ, VH-SSR, and VH-SSU, were painted on, while on the rear fuselage I had affixed a map of the world with our route dotted in. As we would be landing at eighteen international airports and passing through fifteen different countries, I felt that one picture was worth a thousand words and would overcome communication problems. Finally stickers of the Australian flag, the inevitable kangaroo and our Tocumwal Gliding Centre, finished off the design.

Romanoff, our test pilot spoke no English so our check flights were carried out by sign language, some school-boy French and a smattering of pidgin German picked up from our German visitors. Ghimbau is the name of the field at Brasov. It is all-over grass, still soggy from the recent snow, about 2000 elevation, and the home of numerous moles, small burrowing animals who tunnel just under the surface.

The news of the abortive American attempt to rescue hostages in Iran had just reached us and the international scene did not look encouraging. Then Marshall Tito died and our clearances through Yugoslavia would be delayed at least 10 days. Bill arranged an alternate route through Turkish airspace, and we were ready to go.

Bert being the lightest was first off after Bill. We watched him intently as with the conditions described, we needed every inch of hard ground to get our speed. About three-quarters of the way across he lifted off and was away. My turn next - throttle wide open, revs OK, but nothing much happened, as I was on a soggy patch of turf. With full forward stick I managed to get the tail up and waited for the inevitable bounces off the uneven surface as a result of mole activity. Don't back stick otherwise one gets behind the 'drag curve' and will stay there. With the boundary fence coming up the airspeed began to register, then the Wortmann wing having attained its proper speed, lift off. Hold it down to gain safety speed, gear up, and free of the additional drag we climbed without effort to join the leader.

As we circled over the historic City of Brasov we climbed through the inversion and the layers of industrial pollution so evident in socialist countries, 'Produce, comrades' is the slogan with no one appearing to care about the environment. Civil liberties, as we know them, simply do not exist. Armed guards and police appeared even in our hotel lobby. Yet even though the Romanians work six days a week, those we met and spoke with seemed happy. Certainly they are polite and industrious, despite such a drab environment, lack of consumer goods, and no toilet paper. Over the field we looked down and dimly saw the wonderful factory staff waving us a last farewell, while ahead and on our left, Count Dracula's Castle and the snow-capped peaks over 6000 feet high which we were to cross.

Making good use of the thermals which by now were breaking through the scattered cumulus we soon reached 7000 feet and set course. Underneath us now were the jagged rocks and crevasses with the melting snow cascading down in small streams at tremendous speed, to join the river in the misty valley, while above us scattered cumulus with the penetrating sunlight gleaming on our aircraft which were gently rising and falling with the varying air currents, looking resplendent in white and red paint work. Ahead lay the fertile flood plains and the 'collective farms'; thousands of acres without one solitary tree. On our left, Russia, then the Danube and the Black Sea with Constanta airport coming up. Into line astern for our landing and as we taxied in we noted we were on a fighter base with MIG-21s and 25s in neat lines with sharp noses and swept back wings.

Next morning after some 'security' problems we were cleared over the Black Sea. I obtained clearances from Istanbul and we skirted the city towards the Dardenelles and Gallipoli, the bleak and barren landscape where so many Australians lie buried far from home. Alexandroupous, NE Greece, ahead and we were given a friendly clearance: 'Make straight-in visual approach — maintain own separation'.

Saturday 10th. Over the enchanted, historic Agean Sea, ancient civilisations and forgotten wars. The blue is so penetrating one has to look away to avoid eye strain. Below an occasional yacht, white sails billowing in a gentle breeze, while in the background the yellow sand of an island beckons. Through the Athens FIR and on to Iraklion - 'Approach', we were to report over the small island just offshore, then cleared behind a Boeing 737 for a right base. Watch out for 'wake turbulence' and conscious of the snow on the 8000 foot peaks in the background, we taxied in to receive another very friendly welcome, for Australians are held in high regard here for their heroic defence of the island in 1941.

A stroll through the city is most fascinating as the ancient walls are still intact, the narrow winding streets and quaint limestone buildings seem right out of a history book, but a 20th century touch is evident with TV aerials and air conditioners sticking out at odd angles. Meals at a sidewalk open air cafe, watching the 'passing parade'. The artifacts and handcrafts make one wish for more space and money to bring some home.

The weather report for Cairo seems OK so we depart the following day. About one hour out over the Mediterranean we encounter an ominous front with cloud and rain right down to the sea. Bill does not hesitate. We do a smart 180 degree turn and enjoy a low level run over the island, past old monasteries, olive groves and small villages, through narrow valleys and along the beach till we have to pull up to join circuit at Iraklion. The Gods were kind to us this day, for it is confirmed that Cairo had its worst dust storm in over 40 years with visibility down to 100 yards.

Tuesday 13th — it is still blowing a gale but after a discussion we opt to go as the winds are favourable. As we approach the eastern end of Crete near the Sitia VOR, we notice a huge build-up of cloud on the adjacent mountains. It is mountain wave and without hesitation we head straight for it. Soon we have 12 knots up on our varios, and in no time reach 9000 feet altitude. With this wind we must have a ground speed over 110 knots. Down below the Mediterranean is literally boiling with this strong wind- giant waves and deep troughs with plumes of white spray breaking away from the huge whitecaps that are forming. No place for a ditching but with such a groundspeed we forget about our point-of-no-return, and Bert soon has El Daba on his VOR. We are smack on track! Then quite suddenly the sky ahead changes colour from a cold bluishwhite to a brownish orange with fierce red streaks. Bill suggests we are encountering a dust storm, but as we make landfall we ascertain that it is the reflection of the sun off the desert onto the base of some fairly low cumulus. The wind has dropped. We are abeam of El Alamein, the battle ground of Montgomery and Rommel, the desert of the Romans, Napoleon, and Alexander the Great. Today there is no movement, no tracks, no vegetation, nothing to show the passing of vast amounts of men and machinery, nor the graves of yet more gallant Australians in this forgotten wasteland. The ancient pyramids of Cheops — tombs of the pharaohs, wrapped in mystery, surrounded by argument, often read about, not to be seen. I grab for my camera only to be interrupted by Cairo Control. Approach is exceptionally busy with traffic. Finally we are cleared for runway 23 right on this huge airport where parallel runways are nearly two miles apart.

Cairo — one could write a whole chapter. The overwhelming impression is of traffic and noise. Each vehicle drives on the horn, pedestrians are fair game, no one seems to give way, crowded diesel buses crammed to the very roofs with humanity clinging on precariously to overcrowded doorways, standing on the bumper bars, gaining entrance and exit via the windows, arms and legs everywhere. On more than one occasion we saw some hapless individual fall off. Taxis and motorcycles, some of the latter with from 3 to 5 persons astride, donkeys either pulling a vehicle crammed with produce or carrying enormous loads that defy one's imagination. Interspersed with this an odd camel and a few goats. Fumes, dust, and heat, then the streets with a host of stalls piled with food or junk, dimly lit but well-stocked shops, Arabs and Nubians with flowing robes plus other swarthy looking individuals, contrast with neatly dressed, attractive young women. Set this against a backdrop of huge international hotels and towers with the Nile and its gardens. Add the countless loudspeakers constantly calling the faithful to prayer from the many mosques scattered throughout, and you have a pulsating, modern day Cairo of several million people.

May 20th, and after several days of frustration we depart, having battled security. With the help of an American Colonel Air Attache we finally pass the guards and get to our aircraft. It is already 47°C, sitting in our cockpits it must be 55°C. Even the guard has sought shelter under the tail of a nearby 707. Cairo is busy and for 32 minutes we sit and dehydrate before obtaining start up and taxi clearances to depart into a strong headwind for Luxor over the wastelands, where we land some 4-1/2 hours later in an even hotter climate. After refuelling, my throat is all but closed over and as I pick up my canteen it is so hot I nearly burn my hands but drink I must. Somehow I swallow the almost boiling liquid.

`Baksheesh'- payola, an early morning wait for the officials, a huge Russian-built helicopter (the biggest in the world) and we depart for Saudi Arabia. Over the Red Sea we encounter our first 'blue-out'. With no wind and a calm blue sea reflecting a clear blue sky, no clouds, no land, and no ships, the whole area melts into one translucent mass, with absolutely no horizon. It is an eerie sensation with only the sun to tell us we are still right side up. Maybe it will disappear at higher or lower levels but here we sit. I switch on my turn and bank but I find it has gone U/S. Bert and Bill are weaving about so I guess they too have the same problem. I look down into the cockpit and out and suffer instant vertigo! Thankfully, landfall at Weijh. As we pass the airfield a jet fighter takes off. Are we to be intercepted? Jedda acknowledged my call and gave us our clearance so what now! We soon lose sight of him and set course for Hail over the most bleak and forlorn landscape one can imagine, erosion so severe it has removed every vestige of soil eons ago; there are no trees, no shrubs and no grass. Gnarled, rocky, forbidding hills, mountains and valleys, some spot heights reaching 5000 feet. Pinnacles of rock stand like sentinels or towers of Babel over a valley of death, contours scoured by some tremendous cataclysm with the old courses of lava flow or rivers winding down the lower reaches. It makes one wonder if we are not flying over a lunar landscape. Height control is difficult as the thermal activity produces great areas of sink. Soon we are down to 7000 feet and Bill, who has given the lead to Bert as the VOR and ADF in Bert's machine have much greater range than either of ours, has dropped slowly behind, I ask Bert to slow down. A muffled response and I see him turn so I follow, then I've got 20 knots. Tightening my turn I hit the core of the best thermal I have ever encountered. At an incredible rate we rocket up, while Bill wonders where we have disappeared to, so looking down I direct him: 'Turn 30 degrees left - a little more', then he replies 'I've got it now.' With our varios pegged we spiral up and at 13,000 foot level off. Fresh in heart and with cooler bodies we resume track.

Our maps are liberally dotted with phrases such as 'Data incomplete', 'Aircraft may be fired on without warning', and 'prohibited area'. The position of Hail A/D is 'approximate only'. Over a black mountain range we see a large town and a modern airport, but there is no response to our radio calls. Bill makes the decision. In we go, watching for red lights or tracer but all is quiet as we touchdown and taxi in. A Jeep appears and a friendly American voice bids us welcome.

The Saudis do not engage in manual work and the Americans under contract look after all the maintenance. Quickly we are refuelled and they invite us to their own mess for a good meal and accommodation. That evening they drive us through the city - in the middle of nowhere this modern metropolis with wide freeways, fluorescent lights, highrise buildings, and a tracking station for communication. One can dial anywhere in the world without delay. Modern shops, but no women for this is a strictly Moslem country. On our way in we pass a town square and are advised that this is the public execution arena! Last week 5 men were beheaded here and at least one more is listed in two days' time. The punishment for thieves is to cut off a hand; a harsh country, with harsh penalties.

Thursday 22nd — up before dawn and we buzz our friends to show our appreciation and set course for Bahrein and Abu Dhabi, 732 nautical miles away. Soon we are over real desert and after about one and a half hours we notice eddies of sand on the desert floor 9000 feet below. Gradually these increase to fair size willy-willys which join up into one enormous cauldron of boiling red sand. We are in for a real sandstorm. We claw for height and at 10,500 ft we sit just above the top layers and hope that it does not get worse. Americans having no details, we are on our own. After two hours it begins to abate with the odd patch of desert becoming visible under our aircraft, then a Gulf Air jet reports to Bahrein so I contact him with our details and ask him to relay for us. A well educated accented voice advises us that all details have been passed and I thank him for this courtesy. At least we are now in the system. A pinpoint and then the VOR locks on. We are on track and now in direct contact with the English controllers at Bahrein. Bill

thinks it a good idea to get a wind reading at 10,000 feet for our next leg over the Persian Gulf. So I ask them for one: 'Standby, we will get a read out for you in two minutes'. As we wait I hear a Concorde takeoff, then right on time the pilot comes back, "Wind at 10,000 feet is 330/28 knots'. I thank him, suggesting that next time I am in London I'll get one of those gadgets for my aircraft. He laughs and seems more interested in our motor gliders and our destination- Australia! The camaraderie of the air . . . both ends of the speed spectrum meet and pass unseen.

At Doha they hold a jet on their huge runway till we are over the aid, then the Persian Gulf, a kaleidoscope of colour below us now. As the depth of the water varies so do the colours, fading from pale yellow into greens and blues with other colours such as bronze, jade, and ochre mixed in abundance. Shoals and reefs show their skeletons under the water while the gentle waves make white splashes against their exposed seams - meanwhile the bright sun reflecting its light beams off the surface, produces a thousand mirrors to enhance the picture. There is a contrast. On the horizon the smoke from the various oil wells produces a thick haze as far as the eye can see. Another blue-out later on, then Abu Dhabi bids us welcome and we touchdown after 8 hours and 30 minutes, for an average ground speed of 86 knots.

The Emirate States, oil rich and modern, form more than an oasis with desalination plants, high rise buildings, wide boulevards, tropical trees and flowers and exorbitant prices.

Karachi, 743 miles to go as we take off at first light into the rising sun, tracking out over the land to pick up our drift angle and then 550 miles over the Arabian Sea and yet another much prolonged blue-out. We keep well clear of Iran. Nothing moves, no ships, no land, and no clouds; the sea is calm as we fly over maintaining 9000 feet. For hour after hour we continue until the sun has passed overhead and is well behind us. We have an interesting conversation with an Australian aircraft, one from New Zealand, and an American who relays to Karachi for us and promises to call after his departure in another aircraft. Some two hours later he calls again. Karachi have our details, are we OK? I reply 'Operations normal', but as we have no way of checking our ground speed our original ETA still stands. It is nice to know one has friends even if we never meet. A smudge on the horizon should be the Iran-Pakistan border, but where is the river? Then with the setting sun illuminating it, we see its graceful curves as it enters the sea. An interesting run along the Pakistan coast - dry, desolate and Forbidding - another dust storm generating but this will not affect us as we are still over the water. An isolated fishing village at the end of the world, then Karachi and we step out after 8 hours and 45 minutes, stiff and tired but knowing the worst of the trip is behind us. To date we have covered 3898 miles in 49 hours and 15 minutes.

Karachi — 'baksheesh'- urgers, smells, traffic and substandard conditions with an almost total disregard for hygiene. No wonder there are epidemics in such conditions.

New Delhi is 725 miles and for some obscure reason we cannot track direct. We flight plan their way and cut the corner when it suits us. Initially the country is barren and desolate, gradually improving, but the monsoons are late and so are we. It is hot and dry. Death is about, for Bert suddenly calls, 'Lookout for the birds!'. There must be 200 of them and one just misses my wing. They are vultures, soaring magnificently on the thermals with white heads and dark plumage, with an enormous wing span. They soar in the cooler air waiting to descend on the unfortunate victims in the heat below.

New Delhi. Wide boulevards lined with tropical trees and flowers, roundabouts, spacious, well kept homes (of the rich) and modern hotels. Fortunately, we are spared the sights of Old Delhi.

Next stop Katmandu, Nepal, after a hassle over fuel which was finally settled by no less than the Minister for Petroleum whose Beech 18 was parked next to our motor gliders. Delhi wants to separate us by 3 minutes so I refuse the clearance. This shakes them a bit, then they ask if we are Air Force? I reply 'Ex Air Force but endorsed for formation take off'. Finally I state that we only have one aircraft with Nav gear and our permit to fly is only 'in company'. Reluctantly they grant us a line astern take-off and we are away. As we approach the Himalayas the country improves. Lucknow below, I strain for a view of the old fort. Reciting a few lines from the poem 'The Relief of Lucknow'. I salute the memory of those gallant British soldiers and the unknown Scottish maiden, and we pass on to our first view of the Himalayas. Simra on the VOR, and Bert turns towards the pass and I obtain clearance: 'Report at the valley entrance with field in sight'. The pass looks menacing enough with great mountains disappearing on either side into layers of cloud, steep gorges and precipices with small streams of melted snow cascading down to join the main river, while in the narrow valley floor a mountain road winding about its tortuous path, then guite suddenly through the light mist we see the green covered wide valley of Katmandu. Intriqued, we press on, like sneaking a look into someone's back yard. Ahead, Shangri-La, China, and Mt Everest which remains enshrouded in heavy cloud. Waiting jets, and we are cleared to land. Bill goes off to attend to the usual paperwork and to meet Val Carson who has gone ahead of us at various ports to arrange accommodation, while Bert and I refuel and talk to the various jet captains and others who are intrigued with our motor gliders, and our map showing our route.

The weather prevents our flight around Everest. We are already two weeks late and Bert has to return to Sweden to fly in the Swedish Nationals on the 6th. We leave reluctantly. It is Wednesday 28th, and for 20 minutes we climb on the eastern side of the field to get sufficient height to enter the pass, then we turn leaving behind the postcard tourist Mecca with its shrines, temples, market places, and enchantment. The pass looks marginal but Bill weaves his way through and we follow. Soon we are clear and Bert resumes the lead over the sacred Ganges, with thousands of small holdings, each about the size of a suburban house block where a peasant family earns enough to sustain them for one year.

Oh Calcutta... no, not the musical but the poverty, degradation, men and women replacing cattle as beasts of burden. Little children begging and looking so pathetic one has to avoid their glances, people living on the street, the pavement being their bed, lounge and living room - the gutter their toilet and the hydrant their bathroom. What could one do even with \$1,000,000? The old Colonial Great Eastern Hotel with huge rooms and ceiling fans and a bevy of servants.

None of us is likely to forget Thursday 29th. We depart Calcutta over the spider web of waterways and islands that form the huge Ganges delta. The met briefing was good but we can expect isolated CB build-ups and rain, as we are now in the Intertropical Zone and the monsoons are due. A pleasant crossing of the Bay of Bengal and Bert has Akyab on his VOR before we see it, way out on our left the Chin Hills. Some hills these, 9000 ft spot heights are common, and then the Arakan Yoma Range.

A huge CB south of Akyab draws some comment - it must have a head of 40,000 ft and still growing so we keep an eye on it. We turn at Akyab for our run down the coast, then rain and broken cloud appear ahead. An innocuous bank of stratus lies under us as we turn to pick our way through. I am about 200 yards behind Bert and maybe 200 feet lower, Bill is 300 yards back and 300 feet lower and it is from him we get our first warning. 'Better turn back.' he calls. Bert up above thinks he can continue for a few minutes so I try and close the gap. At 7,000 feet we are already on full throttle and have no reserve left. Suddenly I feel my aircraft shudder and looking down I am surprised to see the airspeed down to 42 knots - with negative flap I am about to stall. Obviously a false horizon! Reflexes and memories of wartime experiences trigger my

actions, stick forward and turn. I grab the microphone and call Bert, 'Turn 45 degrees right, we are in trouble.' I see his wing go down and lose him behind a hill of rising cloud. Without a second to spare I regain speed, level my wings and then enter cloud without any instruments and without a turn and bank to keep me level. Feet off the rudders and with only my thumbs and forefingers resting on the top of the stick, I wait. Initially I can feel the warmth of the sun on the back of my neck filtering through the thin top layers of cloud, but that is soon gone and it is much cooler now and dense. Normally one cannot fly for more than a few seconds in cloud without instruments and loss of control is inevitable! However, it is stable and so is the aircraft. No point in looking inside, so I rivet my gaze on the area ahead. My ears tell me the airspeed is normal and so too are the revs. Terrain clearance (if any) not known. I hear Bill call but the details do not register as my total concentration is on the task ahead. The seconds drag on and it seems like a year, but perhaps it was less than 3 minutes. I sense a lighter area ahead. Is it an optical illusion? No! Sure enough, a fracture in the otherwise solid overcast and a faint blue hole, rapidly closing over, as luck would have it, right on track. I slip through this escape tunnel and am clear! Bert is about 700 feet higher and a kilometre out on my left, so I home in on him. Bill calls and Bert tells him to steer 235, he acknowledges. Later we find out he sank into the same cloud as I did but it was rougher where he was, so he opened his airbrakes and came out about 1000 feet above the hills. I guess he said a few prayers but his only comment was 'I didn't enjoy it'.

Now to rejoin as Akyab has closed over and ahead it looks like the inside of a cow. Fortunately there is a small area of clear sky with one cell of heavy precipitation standing out from the rest. I ask Bill if he can see it. After a few seconds he confirms and that then will be our rendezvous at 7000 feet. We rejoin and then we turn 80 degrees off track towards the hills. We will outrun the front!

I pick up my map and hurriedly draw a freehand pencil line along our new track and note the time. On our right the CB has now grown to an enraged monster. Huge flashes of lightening arc across the black sky, our ADF needles swing crazily as the monsoon releases its pent up energy. Picking our way across the cloud now building up, I follow the lower contours and am dragging my feet. For nearly one hour we fly just above the build-up racing it from point to point, then a break, and below I see a river. It must be a tributary of the Chindwin, for we are over the watershed now. I call Bill to advise, 'I will let down and follow the river out to flat ground.' He replies, 'It looks better ahead.' About 5 minutes later I am relieved to hear him say he can see around the back of the storm . . We have succeeded!

A pinpoint along my rough pencil line and we turn to follow the Irrawaddy down to Rangoon. The country below has been deluged. Great streams of muddy water pour off the high ground and the sun now shining weakly through, has begun to evaporate it, generating small patches of thin mist. The monster still on our right must be 100 miles long by now and I for one, realise just how lucky we were. During the war 613 Squadron RAF encountered a similar build up with sixteen Spitfires. Only eight survived. In Borneo we escorted 8 Kittyhawks into a far less ferocious cell and after a rough ride we emerged with two aircraft missing, never to be found again!

Rangoon Approach clears us for a 'straight in' and we slip into line astern, lining up on the glistening runway, surrounded by a virtual lake of water, as all fields, roads and streams are awash. They must have had 10 inches of rain. Touchdown and taxi in, we are relieved for we have been in the air for just over 9 hours and covered an estimated distance of 660 miles. The Gods were kind to us again.

The Inya Lake Hotel, built by the Russians some years ago, is a building of enormous size, possibly to double as a hospital as wide corridors and doorways are the order of the day, with spacious reception, lobby and banquet areas, and hundreds of rooms. Set beside the beautiful lake, it is idyllic with tropical plants and flowers of every possible

description, hibiscus, tulips, rhododendrons, lilies, palms interspersed with flame trees, jacarandas, coconuts and rain forest trees, all set in lovely green lawns and divided off by wide paths and entrance roads. At night, alight with fluorescent tubes, it attracts enormous numbers of birds who keep up a constant chatter in the artificial day.

The Golden Pagoda - native stalls in tree lined streets. Fuel is a problem but with the help of the Romanian Embassy, we are soon attended to. It is now June 1st and we leave for Penang. A special VFR clearance is needed as the delta is covered with mist and low cloud, for it rained all night. Careful fuel drains, and I am number three for takeoff. Bill and Bert depart and I follow on the water strewn runway. Lift off and my engine falters so back on again, closing the throttle. I open it slowly – it picks up and I climb out. As I turn at about 100 feet to join up it falters again. Christ! What a splash I am going to make, as I am too low to turn back. I close and then reopen the throttle and at about 30 feet it roars into life again and the trouble disappears. Maybe carbon on the plugs or ice from the water. Fortunately it is gone.

We climb to 4000 feet over the Gulf of Martaban with Kipling's 'Old Moulmein Pagoda' some 50 miles on our left. We pass Tavoy and then the Mergui Archipelago, a myriad of Islands and rocks, no doubt a sunken mountain range caused by some enormous cataclysm eons ago, which forced up the nearby Isthmus of Kra. A kaleidoscope of colours with an almost hypnotic atmosphere, tranquil today, as we pass by under a mantle of broken cumulus about 500 feet above us. Blue and green waters with an occasional splash of white, from a school of fish or a nearby shoal, yellow beaches, bronze sheer faced rocks, steep sided islands, covered with mantles of lush tropical growth set against a blue sky, and bright sunlight reflecting the various patterns which are broken by the shadows from the drifting clouds. It is in this area that Sir Charles Kingsford Smith, caught in bad weather, probably monsoonal like we had recently experienced, low down in heavy rain, peering out, desperately trying to remain in visual contact hit one of the obstructions and then oblivion. We salute his memory and his achievements.

Phuket, Thailand. We report at the Causeway and are cleared to join downwind after a DC9 has taken off. A happy, helpful refuelling crew, some refreshments and we are off. Penang Approach clears us past Butterworth and we taxi in and tie down at the base of their huge tower.

Monday 2nd - Bert busies himself to obtain a flight to Sweden - he has less than three days. I manage a ride in the jump seat of a Boeing 737 to Singapore to join my wife Joy, as we have 14 days to fill in till Bert returns. Bill ferries our machines to the RAAF Base, Butterworth where the Commanding Officer and his staff have made us very welcome!

Monday 16th. Having exhausted my credit, Joy returns to Melbourne with Qantas, while I return to Penang to meet Bill. Bert has been delayed. Bill and I discuss the situation as our Indonesian Visas are due to expire and so is our ferry permit. We are to take two RAAF staff to Ipoh with us to inspect some old gliders. I take W/C Peter Coutts and Bill takes LAC Bill Bartlett, an Electrician on Mirages, but a GFA instructor and current power pilot. Our day is highlighted by an invitation from the captain of the King of Malaysia's VIP jet to sit with him in air conditioned comfort in the King's own suite, where we discuss our trip and the uses of motor gliders in Malaysia.

On our return to Butterworth, Bill confides in me that he has asked Bill Bartlett to fill in for Bert. A few problems of leave and transport are rapidly sorted out by Peter Coutts and his charming wife and we are ready. A few circuits with Bill and I send him off solo to get familiar. Bill Riley meanwhile attends to the masses of paperwork, and we then give a few of the helpers some local flying. It is the first time we have been able to soar with the propeller fully feathered and we are both impressed. A cheery farewell, thanks to the RAAF personnel, and we fly back to Penang for Customs and fuel.

On the way to Singapore the next morning, we 'street' along some good lift towards the Johur Baru NDB, getting a no-hassle clearance into Selectar despite the huge amount of traffic, and the close proximity of several other airports, we are cleared again without hassle over Singapore International for Jakarta. Soon we are crossing the Equator and Sumatra with rain showers and poor visibility across huge swamps; no roads here, only rivers. An occasional plume of smoke betrays the presence of the small village, a small motor boat towing a huge train of log rafts and scarcely moving, then the Java Sea and the occasional oil well burning off excess gas and adding to the already rather dense haze. Jakarta Approach is busy but we are soon slotted in for a landing at Kemayron. After landing we taxi to a small parking bay and make haste to push our aircraft back as we are parked right against the main taxiway with a huge number of turbo-prop aircraft constantly coming and going. The tarmac is busy with at least 20 different aircraft loading or unloading; the air reeking with kerosene fumes.

Jakarta is the capital over 13,000 islands and 100,000,000 Indonesians, hence the activity. Fuel is cheap. On our drive through teeming traffic we pass the famous statue of 'The man breaking his shackles', standing in an open park well above the trees and dominating the area. It signifies the determination of the Indonesians to forge ahead.

Next leg Bali. A right turn after takeoff soon clears us from this beehive of activity and we pass over intensely cultivated land, rice, sugar and other produce, several railways, neat villages and farms with typical Dutch-style designs. At the Cirebon NDB we follow the coast past numerous fishing villages, each with dozens of single man dugout type canoes. How the owners identify their own is a good question. Lurking in the background are monstrous volcanos with jagged peaks and craters, many over 11,000 feet high with a ring of snow girdling their upper levels. I think of Krakatoa which in 1883 blew an entire island out of existence and created huge tidal waves, with the sound being heard over hundreds of miles and the dust causing magnificent sunsets over much of the world for nearly 6 months.

We avoid Surabaja zone due to traffic and I look at the harbour where a good friend of mine and his Catalina were lost laying mines during the war. Cutting the corner between two volcanoes we head straight for Bali and even though we are at 3000 feet we literally low-fly over the lava flows between them. Then the yellow beaches of Bali appear and low cloud gathers. Across a wide estuary and past a village we are forced to descend to maintain VMC. The beaches now change colour as we pass coconut plantations, following the coast till we sight the airport and join for a landing. There are two jet aircraft waiting and I land number two. I note Bill touches down and taxis, so I hold mine up with power about two feet off the runway for about 2000 feet and as Bill clears I cut power and drop on ready for an immediate exit feeling rather smug with the comment from the jet, 'Well, how about that!' We tie down among the skeletons of five old DC3s, refuel and out to our hotel along narrow, tropical edged roads and heavy traffic.

Enchanting Bali, it is all the travel brochures say, and we relax and spend a day sightseeing, buying carvings and visiting sights too numerous to mention.

Thursday 26th, Kupang is 565 miles away but there are head winds. We depart and keep down fairly low, island hopping in the early morning sun. Lambok with its 12,224 foot crater lake, dark and ominous, slumbers on our left. The Sumba Strait and the large island lie ahead. We have Waingapu on the Aid but low cloud and rain develop. We fly over land now, trying to get around the huge cell building up, across terrain very similar to Australia's north - not very fertile with patches of scrub and a few cattle. Eventually we are forced to turn and head back to the inviting strip of Mau Hau, to land just before the rain hits us, in a screaming crosswind. We tie down beside a sick looking DC3, which

is minus one propeller. A 44 gallon drum props up one undercarriage leg. It appears it did a ground loop, with a full load of passengers, a few days earlier! The off-duty controller and the manager turn up plus a score of locals, who hand us a Coke, and are generally very pleasant. After about an hour the storm abates and we say goodbye. Just as we leave the coast my motor has its period of 'automatic rough' which persists for about 15 minutes then clears up. A solitary ship brings some assurance, then the weather improves and the run into Kupang is soon over. The Customs inspector at Kupang really went over us. Although it was dark by the time we finished fuelling, I had to unlock both Bill Riley's aircraft and mine, providing my own flashlight and pull out all gear. Bill in the meantime had gone about his usual task of organizing general declarations, flight plans, weather and briefing. When it came to my Romanian glucose emergency rations the inspector asks 'Cocaine?' 'No', I reply, 'Have one, it's not too good.' He politely refuses but insists on breaking off a corner, and rapidly spits it out again. At least we have the same reaction.

We take a ride in a quaintly decorated bus to a real crummy hotel and a meagre meal. Next morning we discuss our route. With headwinds, it is decided to head up the Timor coast for two hours, then turn for our run into Darwin.

It is Friday 27 June and we leave on our final leg out across the hills and then following the coast. Even at this distance, Darwin NDB comes in loud and clear. The wind at the coast is not strong and we make good time, then at Ponta Metibat near the 126 degree East longitude line, we turn for home. Our drift angle shown by the ADF remains steady at 25 degrees so we watch it intently, but it does not move. Bill Riley is leading with Bill Bartlett and myself spaced out about 200 yards on either side. Again, no real worries about 'point-of-no-return' as we feel any help needed must come from Australia. The engines do not know they are flying over water. This attitude gives one great piece of mind. In good stable weather we drove on past occasional cloud banks, but no rain. The sea is calm, now a change of colour indicates a surface wind change, but it does not affect us. Our needles have not moved. Then Bill Riley calls. His VOR has locked on and we are within one degree after nearly 5 hours over the water. He is justifiably proud of his navigation and soon the smudge on the horizon solidifies. It is Bathurst Island! A friendly TAA aircraft relays to Darwin for me, then as we approach the yellow beach of Cape Fawcett, we are in direct contact. Cleared direct we soon make out the oil tanks of the port and the familiar city and then the airport. Gear down for a landing on '36'. We are instructed to taxi to the old runway and tie down. Customs are there with a group of the Top End Gliding Club whom we have not seen for two years. Our canopies have been open one notch for the entire trip but our Customs man with his pressure pack does not appreciate this. 'No use spraying now', he says, but not to be outdone he asks for our water. Sensing what he is about to do, I grab my canteen back and have a last drink before he spills it onto the hot ground. Bill Smart is there with his car and we are soon having our beers in the Aero Club, then to our motel and a good meal.

Next day we visit the gliding operations at Batchelor, driving out past our old fighter strips beside the road - the runways being used for drag racing but the dispersal areas covered with scrub. It was 35 years ago; I must be getting old! An easy trip to Tenant Creek down familiar territory past the repeater stations with their numbers clearly painted on each roof.

Alice Springs next day and it is here for the first and only time in our entire trip, we are held outside the zone for about 10 minutes. Reason: traffic, two other aircraft! It is time our DoT went to Singapore to learn a thing or two. Broken Hill, our goal for the following day, but unfavourable winds and storm weather force us to stay at Leigh Creek.

Thursday 3 July. It has rained all night and the muddy roads stick to the tires; as we drive out to the airport there is low stratus and fog. We wash the accumulated dust off our wings and wait. We taxi out once, but miss the hole that appears, and back again.

Then a clear spot to the west, and out we go to climb above and set course. We hear a twin-engined plane call but it is not till the next day we know he crashed on his way to Adelaide. Past Broken Hill the weather deteriorates again, and we find a hole and with gear and airbrakes extended manage a steep descent to about 500 feet, into heavy rain showers. No one has a map of this area but I fish out my pocket book with 2 QN Deniliquin on it, and we soon have a needle. Scraping around various showers we get around the back of the front and then home at last. TOCUMWAL!

A photographic aircraft comes alongside for the TV cameras then I break off and buzz the hangar and the waiting crowd. I feel I am entitled to do this, a quick wave and I join circuit, land, taxi and switch off. More cameras and TV, then I see my father with my wife and mother. He has been sick but with a broad smile and a lively step he walks over to greet me and we shake hands. Little did I know then that within 48 hours he was to suffer a stroke and pass away. However, he died happy and I feel that the Gods were kind to permit us this happy reunion.

Next day to Essendon to complete the journey. At Yan Yean we are met by helicopters and escorted into our final landing in 35 knot winds. We taxi in, amid more photographers, to meet friends and well-wishers. We climb out and I fill in the last leg on our now much fingered fuselage maps.

We have done it! Romania to Australia - the first flight by three motor gliders, flying on 25 days we averaged 77 knots for the 11,292 mile trip to spend 146 hours and 5 minutes in the air.

Would we do it again? — ask me tomorrow!