ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 1 of 13

TWP Foreign Site Visit Safety Procedure

I. Purpose:

This procedure consolidates TWP safety directions and guidelines for foreign travels. All TWPO and BOM personnel are required to follow this procedure upon their trip to three research facilities in the tropical Pacific: Manus, Papua New Guinea; Nauru, Republic of Nauru; and Darwin, Australia.

II. Cautions and Hazards:

 Hazards are itemized in three Site Safety Plans. (See References for detailed document list)

III. Requirements:

• Review safety documentation referenced and attached in this procedure.

IV. Procedure:

A. All TWPO and BOM Personnel

- Participate in an ES&H briefing teleconference before each visit. (See Attachment 1: ES&H Briefing Teleconference Outline Template)
- 2. Notify TWPO 45 days prior to the desired start of travel to begin the DOE foreign travel approval process. (See *Foreign Pre-Travel Procedure*)
- Enter a visit request at ARCS Site Access Request System (SARS) on the Internet (URL: http://www.db.arm.gov/SARS/) for each site you are visiting.
- 4. Read Site Safety Plan for each site you are visiting.
- Call TWPO upon arrival in each new country.
- 6. Call TWPO to notify your whereabouts daily.
- 7. Work to a predetermined task list. (See Attachment 3: Site Visit Task List Template (technical); and Attachment 4: Site Visit Task List Template (management))
- 8. Send an email report to TWPO about work performed daily.
- 9. Meet with team members and Observers before starting work.
- 10. File report upon return for use in the official DOE report. (See *Foreign Post-Travel Procedure*)

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 2 of 13

B. TWPO State-Side Support during Visit

- 1. TWPO administration personnel will track whereabouts of traveler.
- 2. TWPO daily operations coordinator will respond to needs identified in daily communications and reports.

V. References:

- 1. Manus (ARCS-1) Site Safety Plan, PRO(ESH)-003.
- 2. Nauru (ARCS-2) Site Safety Plan, PRO(ESH)-010.
- 3. Darwin (ARCS-3) Site Safety Plan, PRO(ESH)-013.
- 4. Foreign Pre-Travel Procedure, PRO(TWPPO)-068.
- 5. Foreign Post-Travel Procedure, PRO(TWPPO)-069.

VI. Attachments:

- 1. ES&H Briefing Teleconference Outline Template, FM(OPS)-040.
- 2. ARCS Safety Inspection Checklist, FM(OPS)-039.
- 3. Site Visit Task List Template (management), FM(OPS)-038.
- 4. Site Visit Task List Template (technical), FM(OPS)-037.

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 3 of 13

Attachment 1: ES&H Briefing Teleconference Outline Template, FM(OPS)-040

ES&H Briefing Teleconference Outline for SV

Before Leaving for Overseas:

- 1. Send Larry Jones:
 - Emergency contacts in U.S.A.
 - Your itinerary including hotels.
 - A copy of your passport via fax at 505-667-9122.
- 2. Submit a "Site Access Request (SAR)," using the link on the TWPO home page: http://www.twppo.lanl.gov/.
- 3. Make sure your laptop has virus protection.

Logistics:

- 1. Power is 240/50hz use power converters and outlet adapters.
- 2. PNG baggage limits 30 kg max. with <u>two checked</u> and only <u>one carry-on</u> (similar with Nauru).

General Site and RESET Management:

- 1. _____ is in charge at Nauru and Manus.
 - Work to help the team leads.
 - Work to agreed upon hours 10 hrs per day max.
 - Although task list identifies a lead responsible, others can help out. (Tasking list for SV-XXXX is on the TWPO website.)
- Observers are encouraged to do inventory, shipping, and help out with tasks INVOLVE THEM!
- 3. David Reass is in charge of stateside support.
 4. _____ will lead a short meeting each morning to lay out the day's work plan depending on the weather, etc.
- 5. Identify hazards of the work and plan how to deal with them.
- 6. _____ is to file Daily Reports via email. (Reass will send task list with template.)
- 7. _____ is to perform daily ftp data transfers.
- 8. Individuals must help by:
 - Volunteering to help and take on tasks.
 - · Reporting progress to Daily Reporter.
 - Documenting configuration changes VERY IMPORTANT ON CALIBRATION VISIT!
- 9. _____ is to do Audit-in site condition and note on 1st Daily report.
- 10. _____ is to do Audit-out at each site.
- 11. Call TWPO at 505-667-1186 upon arrival in Australia, Nauru, or Manus (VERY IMPORTANT DUE TO 9-11 EVENTS) and report in every day (the Daily Report will

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 4 of 13

do when on site) – Jones has a checklist he has to show LANL EES Division Leader to prove that TWPO is keeping track of you.

12. Call TWPO at 505-667-1186 upon return to U.S.A.

Observer Interactions, Site Rules:

- 1. Sign in as visitor upon arrival and review the Site Safety Plan.
- 2. No alcohol is allowed on site.
- 3. STAY OUT OF LOCAL WORK POLITICS.
- 4. Include Observers in your work.
- 5. Take time to train Observers.
- 6. Keep site and the vans clean. (Set an example!)
- 7. Work to procedures. (Set an example!)
- 8. Possibly hire local security during visit. (Evaluate each trip.)

Site Regulation Jurisdiction Guidance:

- 1. Manus Site (ARCS-1):
 - <u>New</u> work to comply with Australian regulations need to locate them and reference them.
 - Comply with Manus Site Safety Plan stored in the E-Van.
 - No work without approval of site OIC, Site Visit lead, or TWPO management.
- 2. Nauru Site (ARCS-2):
 - <u>New</u> work to comply with Australian regulations need to locate them and reference them.
 - Comply with Nauru Site Safety Plan stored in the E-Van.
 - No work without approval of site OIC, Site Visit lead, or TWPO management.
- 3. Darwin Site (ARCS-3):
 - Comply with Australian regulations need to locate them and reference them.
 - Comply with Australian Department of Defense regulations need to locate them and reference them.
 - Comply with Darwin Site Safety Plan stored in the Operations Center.
 - Do not perform any work without approval of Lead Technician Rex Pearson.

General Hazards:

- 1. Before starting work analyze the hazards.
- 2. Plan for the hazards.
- 3. Stop work if there are concerns for ES&H incidents.

Note: Safety Plans are also available on the TWPO website – check them out!

Electrical hazards:

- 1. Power panels:
 - 416V power only local utility company technicians and electricians are allowed to work.

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 5 of 13

- 110/220V only BOM/LANL technicians and electricians (only utility company at Darwin) are allowed to work.
- 2. Observers are prohibited from all electrical power work except 24V DC (but take care with battery acid).
- 3. Lock-out/tag-out is required for all work on energized systems.
- 4. Diesel Generator maintenance work and battery service are performed by Caterpillar (or BOM/LANL technicians).
- 5. Diesel Generator routine operations are covered by site procedures, *PRO(GEN)*.

Other hazards:

- 1. SMET tower take care in lowering the mast and with minimum of two people.
- 2. MPL is eye-safe laser.
- 3. MMCR stay off I-Van roof near the MMCR antenna.
- 4. Pressurized gasses:
 - H2 Generator is maintained by trained BOM personnel.
 - Balloon launching using pressurized gas is performed as per the following procedures:
 - ⇒ BBSS Launch Operation, PRO(BBSS)-002.
 - ⇒ Launching Balloons Using Helium or Other Commercial Gas, PRO(BBSS)-016.
 - ⇒ BBSS Consecutive (Two) RS-90 Launch Procedure, PRO(BBSS)-019.
 - Gas cylinder handling as per *Compressed Gas Cylinder Handling*, *PRO(OPS)-031*.
 - Move gas cylinders using dolly on site
- 5. H2 Generator caustic chemicals are handled by trained electrolyzer personnel only.
- 6. Gasoline (petrol) shall not be stored on sites.
- 7. Operate portable gasoline generator according to Owner's Manual on site.
- 8. Hand tools are to be used by BOM/LANL/ARM technicians only.
- 9. Stairs are on site for the instrument platforms use them instead of ladders.
- 10. During thunderstorms/lightning, stay inside mainly in Darwin.
- 11. Be aware that there are Middle East refugees in Manus and Nauru don't take chances.
- 12. In Port Moresby, stay in the hotel complex and NEVER travel in the city alone best with a local, and NEVER at night. (People have been shot near the hotel!!)

Safety equipment at site:

- 1. Emergency contact phone numbers are posted in the E-Van.
- 2. Fire extinguishers are stored in each van.
- 3. Outdoor Emergency shower is near H2 Generator (Manus, Nauru).
- 4. First-aid kits are in the E-Van.
- 5. Safety glasses and gloves are stored in the storage van.
- 6. Dollies, rolling carts for boxes, and gas cylinders are available on site.
- 7. Ear protection is stored in the U-Van GENSET.
- 8. Iridium phone in Manus is under the D-Van seat.

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 6 of 13

Take care of your health:

- 1. See your doctor, go over CDC recommendations, and get your shots well before leaving (e.g., malaria, hepatitis, typhoid, dengue fever).
- 2. First-aid/CPR training is recommended prior to your travel.
- 3. Emergency evacuation insurance recommended for PNG and Nauru know how to engage it (LANL provides this with foreign travel packages).
- 4. Take general medicines with you (e.g., general antibiotics, diarrhea medicine, decongestants, etc.).
- 5. Take ample supply of special medications you need they will probably not be available overseas.
- 6. Carry critical medicines (e.g., malaria, asthma, etc.) with you not in checked luggage.
- 7. Inform teammates of medical conditions of which they should be aware.
- 8. Drink bottled water in PNG and Nauru.
- 9. There is a risk of the following illnesses:
 - Malaria in PNG you must take appropriate medicine and avoid mosquitoes.
 - Dengue fever in PNG and Nauru, no prophylactic available use deet for repelling mosquitoes.
 - Melioidosis in Darwin don't hand dig in the dirt during wet season.
- 10. Know signs of dehydration and heat stroke.
- 11. On the first day at the site, visit lead should buy enough bottled water for EVERYONE for the week and keep it on site (water purchases are reimbursable).
- 12. Use sunscreen, especially if using doxycycline.
- 13. DO NOT WORK AT SITE ALONE!

Driving:

- 1. Drive slowly!
- 2. Do not drink and drive!!
- 3. Avoid driving after dark.
- 4. Take iridium phone when driving in Manus.
- 5. Travel in pairs
- 6. "Drive away" policy:
 - POM yes.
 - Manus no, if with a local.
 - Nauru no.
 - Darwin no.
- 7. Drive on left side.
- 8. Be careful when stepping off curb.

Recreation/social life:

- 1. Respect local culture.
- 2. Go in pairs.
- 3. Snorkel/swim in pairs.

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 7 of 13

- 4. Do not boat alone, and always take life preservers.
- 5. Be careful of crocodiles (Manus, Darwin), Jellyfish and snakes (Darwin).
- 6. Be aware of ciguatera, fresh reef fish poisoning.
- 7. Do not out after dark.
- 8. Avoid drinking sessions with locals.
- 9. No romance with locals.

Special Issues/conclusion:

- 1. We are very concerned about your safety, especially after the 9-11 events.
- 2. Keep a low profile and do not "advertise" that you are from the U.S.A.
- 3. When on travel, go in pairs, lock your hotel doors, keep track of your stuff, and do not flash cash in public.
- 4. Be aware of your surroundings and use common sense You are a LONG way from home!
- 5. The TWP management has trusted in its judgment to make the call on your foreign travel do not put Larry Jones in jeopardy by betraying that trust with a "the rules don't really apply to me" attitude.

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 8 of 13

Attachment 2: ARCS Safety Inspection Checklist, FM(OPS)-039

ARCS Safety Inspection Checklist

Date:			
Site:			
Inspectors:			

Inspection Items:

- 1. Scan safety manual, sign in as visitor, and very sign in list is being used.
- 2. Record date of site safety manual.
- 3. Conduct general site walk through w/ OIC, Observers.
- 4. Check fire/smoke alarms (listen for low battery beep but do not touch it will shut off the power to the van put your observations on the "Action" list).
- Check safety equipment:
 - a. Fire extinguishers in E, D, I, U, ISS and Storage Vans (test an old extinguisher for a demo?)
 - b. flashlight in E, D, I, U, ISS Vans
 - c. First-Aid kits in E-Van, sunscreen
 - d. Safety glasses, gloves
 - e. Ear covers in U-Van door
 - f. Life jackets (Manus, Nauru)
 - g. Iridium phone (Manus only)
 - h. Cargo dolly
 - i. Gas cylinder dolly (Manus, Nauru)
- 6. Check for tripping hazards, condition of stand stairs, high platforms, reflective tape needed.
- 7. Check emergency shower (Manus, Nauru).
- 8. Check lightning rod bolt conditions.
- 9. Check lightning detector (Darwin).
- 10. Check for emergency numbers on wall of in side E-Van.
- 11. Verify that no gasoline is stored at site.
- 12. Ergonomics issues.

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 9 of 13

- 13. Review status of Middle East refugees (Manus, Nauru).
- 14. Review High hazard items with Observers:
 - a. Electrical review rules
 - b. Gas cylinders inspect, and review handling procedure (Manus, Nauru)
- 15. Housekeeping.
- 16. Other.

Follow-Up Action Assignments:

•

Safety Training (possible):

- RESET Technician training plan (LANL, BOM)
- Observer Training Plan (H2 Gen, site hazards briefings)
- Reference Site Safety Plan
- Use Observer Training Plan
- Videos
- Fire extinguisher demo

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 10 of 13

Attachment 3: Site Visit Task List Template (management), FM(OPS)-038

Site Visit SV-MMYYS Task List (management)

Dates:

- Manus:
- POM:
- Nauru:

SV Team:

Manus tasks:

- 1. Observer safety training (housekeeping and teamwork videos)
- 2. Site safety inspection
- 3. Meet with Pearse:
 - a. Receipts
 - b. Shipping issues
- 4. Go over Anuma task list
- 5. Deliver revised Site Safety Plan
- 6. Deliver revised Observers Training Manual
- 7. Observer dinner

POM tasks:

- 1. Meet with Luana, Thompson, Gabi
 - a. Personnel
 - b. Observers
 - c. Funds
 - d. Other issues

BOM tasks:

- 1. Meet with Baldwin, Pearson
- 2. Other

Nauru tasks:

- 1. Observers safety training
- 2. Site safety inspection
- 3. Deliver revised Site Safety Plan
- 4. Deliver revised Observers Training Manual
- 5. Meet with IED, Duburiya, Kaierua, Tyrone
 - a. Receipts
 - b. Rosters
 - c. Overtime
- 6. Personnel issues

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 11 of 13

- 7. Tyrone How to operate if government has problems paying Observers
 8. Attempt to get cash from Bank of Nauru account (Straub)
 9. Go over Kaierua task list

- 10. Discuss SAT phone listings with Kaierua11. Discuss petty cash receipts with Kaierua
- 12. Cash to Kaierua
- 13. Go over Duburiya task list
- 14. Observer dinner

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 12 of 13

Attachment 4: Site Visit Task List Template (technical), FM(OPS)-037

Site Visit SV-MMYYS Task List (technical)

Dates:

- Nauru -
- Manus –
- Darwin -

Team:

- Nauru -
- Manus –
- Darwin -

Nauru Tasks:

- 1. General site condition status
- 2. H2 generator maintenance (Culgan)
- 3. Calibration, comparison, changeout tasks (if CAL trip)
- 4. Routine maintenance tasks (list from Apple)
- 5. Visit-specific maintenance tasks (list from Apple)
- 6. System repairs, visit-specific tasks (list from Reass)
- 7. System changeouts, installations
- 8. Sending data back to mentors
- 9. Observer training as needed
- 10. Packing up and shipping equipment for return
- 11. Audit-Out

Manus tasks:

- 1. General site condition status
- 2. H2 generator maintenance (Culgan)
- 3. Calibration, comparison, changeout tasks (if CAL trip)
- 4. Routine maintenance tasks (list from Apple)
- 5. Visit-specific maintenance tasks (list from Apple)
- 6. System repairs, visit-specific tasks (list from Reass)
- 7. System changeouts, installations
- 8. Sending data back to mentors
- 9. Observer training as needed
- 10. Packing up and shipping equipment for return
- 11. Audit-Out

Darwin tasks:

- 1. General site condition status
- 2. Calibration, comparison, changeout tasks (if CAL trip)

ARCS PROCEDURE		PRO(OPS)-035.000
	TWP FOREIGN SITE VISIT SAFETY	
	PROCEDURE	13 August 2003
Author: L. Jones		Page 13 of 13

- 3.
- 4.
- Routine maintenance tasks (list from Apple) Visit-specific maintenance tasks (list from Apple) System repairs, visit-specific tasks (list from Reass) 5.
- 6.
- 7.
- 8.
- System changeouts, installations
 Sending data back to mentors
 Observer training as needed
 Packing up and shipping equipment for return 9.
- 10. Audit-Out