

RAFT BUILDING

Goal – Purpose of the activity.	
Raft Building requires participants to work in groups to create a structure (i.e. a raft) that is buoyant and sturdy enough for team members to paddle it over water. Each team will be given a set amount of equipment and time to plan, build, test and then if needed make changes to their raft. This activity requires the participants to draw on teamwork, communication, and planning skills.	
Participants	Leadership and Qualifications
Participants are those persons who undertake the activity, and who are not a leader or assistant leader for the activity. Dependent Participants are persons owed a duty of care by the activity provider who is reliant upon the activity leaders for supervision, guidance and instruction to support the person's participation. All participants are to be considered Dependent Participants for this activity. There will be a 1 active participant who will be attached by the Activity Leader.	Adventure activities must be led by competent people who have appropriate skills, knowledge and experience. Providers must ensure activity leaders involved in activity delivery: • Conform with the providers' risk management systems • Have current, verified and documented skills, knowledge, experience • Only assume roles within their skills, knowledge, experience • Provide an appropriate level of supervision for the activity context • Are fit to fulfil their duties (e.g. managed for health, fatigue, medications) • Comply with appropriate activity-specific recommendations of activity leader to participant ratios. Activity leaders must be competent: • In the use of the paddle-craft been used • In the required practices in guiding an activity using that type of paddle-craft • In operating in the environment and waterway being used • In appropriate rescue techniques for the paddle-craft and waterway environment.
Participant/Leader Ratios	
Ratio 1:12 + 1 School Staff Member (assistant Leader) Non School groups 1:12 + 1 Assistant Leader Lake Cooby is "a Confined body of inland water" and as such the Instructor to Participant ratio recommended by the Inland Water Paddle Craft Australian Adventure Activity Good Practice Guide.	
Operational Procedures	Location: Lake Cooby
Pre Activity • Check the weather forecast for the day • Check all equipment (pipes, barrels, rope, paddles and life jackets) • Move all equipment to the water front. • Separate equipment evenly into two teams Activity Briefing • Check that all participants have hat, water bottle, sunscreen and correct clothes (wet clothes) • Give Participants a safety brief for how to wear a Life Jacket. • Size up and get kids to put on life jacket, explain that they are not to be taken off until the end of the activity. • Brief them on the activity, (show them some simple knots to tie, the objective of the activity.) • Split them into groups. During Activity • Check in with each group • Step in when they need help (help with knots) • Stop and do a quick check in brief about how the group is going. Ask them what is happening?, What they could do better?, What is work and what is not work?	

- Once the rafts are built or the group runs out of time get the participants to test out the rafts on the water.

Post Activity

- Get participants to deconstruct their rafts and put all the equipment into piles to be collected later.
- Debrief the activity, (what happen, did you work well together, could anything been improved on, what can you take away from this activity.)
- Collected all equipment from the waterfront and put back in the shed.
- Check and note any damage, to be repaired for the next session.

Equipment and Logistics

First aid kits (in a dry bag or appropriate container) appropriate to the location and level of training must be carried.
UHF Radio and mobile phone

Equipment Detailed Summary

Paddles

Paddles should be in good working order, be buoyant, appropriate to the activity and the correct length for the paddler. Spare paddles must be carried on all trips.

Personal flotation devices / Lifejackets

The current standard is AS 4758, which has replaced AS 1512-1996, AS 1499-1996 and AS 2260-1996. Lifejackets that meet these previous standards are still acceptable to use if they are in good condition.

For use in partially smooth waters

- 'Level 50' for lifejackets made to AS 4758. This type of lifejacket:
 - helps keep you afloat but does not have a collar to keep the head above water
 - can be worn in smooth waters as well
 - can be used by skiers or people being towed in smooth or partially smooth waters
 - can be used by PWC riders in smooth and partially smooth waters or beyond those waters.

Maritime Safety Queensland Website: <https://www.msg.qld.gov.au/Safety/Life-jackets>

Rescue equipment

Rescue equipment that is suitable for the location or trip and category of water conditions must be in good condition and readily accessible. Staff must be proficient in its use.

Clothing

Personal clothing appropriate to the conditions (to protect against sun, wind, rain, cold) including: wetsuits, thermal underwear, fleece, paddling jackets, suitable footwear (i.e old track shoes, wetsuit or aquatic booties); Thongs and open toed sandals are not suitable / appropriate.

Sun protection (wide brim hat, sunscreen SPF 30+, polarized sunglasses, long sleeve top or paddling top (cag))

Clothing is the individual's primary protection against severe and variable weather conditions. Clothing lists need to be appropriate for the activity, the environment and the season.

Participants must dress in a manner that will not hinder flotation. For example, heavy boots or bulky clothing must not be worn, nor a waterproof jacket over the top of a personal flotation device. Participants must wear footwear suitable both for in the craft and for use in the event of a capsize or a walkout.

Glasses should be secured in some way and no loose jewelry worn. Wearing rings is not advised unless they are taped. A complete change of clothing should be available and carried on overnight touring trips in waterproof containers.

Rope
Barrels
White PVC Pipes
Bamboo Poles

Levels of Challenge and Possible Variations

N/A

Safety Considerations

Sun Safety

Sunburn is a risk for anyone who participates in outdoor activities, particularly in Queensland. Leaders should take reasonable steps to prevent or minimise the likelihood of staff and participants suffering excessive sun exposure.

Weather

Effective planning requires access to up-to-date weather and fire information, which is generally available through newspapers, radio and television. The most up-to-date information is available on the website of the Bureau of Meteorology at www.bom.gov.au/qld.

Or <http://www.eldersweather.com.au/qld/darling-downs/geham>

For more details please see corresponding Risk Assessment

Emergency Management Procedure

- | | |
|----------|---|
| A | Assess situation, call emergency services, assist those in danger |
| E | Evacuate students, staff and visitors, if appropriate |
| I | Inform School Camp Leader onsite and off site, Camp Cooby Directors or Camp Manager if not onsite |
| O | Organise resources, advise parents |
| U | Undertake recovery operations and return site to normal |

Risk Assessment

Danger.	Risk Description	Risk Level.	Management Strategies.	Residual Risk Assessment – after Management Strategies.
Environment.				
Sun exposure	Sunburn, dehydration, Heat exhaustion/stroke	M	Participants advised on appropriate clothing and equipment. Clothing with sleeves must be worn under PFD'S. Participants carry minimum of 3L water. Refill stops. Particular pointers to apply sunscreen (minimum SPF 30+ recommended) to backs of hands and inside thighs. Regular rest stops. In Shade if possible) Encourage peer reminders and monitoring. Monitor Weather. www.bom.gov.au/qld . Or http://www.eldersweather.com.au/qld/darling-downs/geham	L
Winds	Capsizing Multiple Rescue Group	S	White caps are an indication of thinking about strong	L

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	Separation		management strategies or cancellation. Set safety guidelines- distance between canoes, whistles, rafting up. All Participants are to wear activity specific safety equipment (PFD/Life Jacket.) Set expectation of group traveling together. Participants are empowered to manage group distance and to show raft up sign if the group gets too far apart. Ropes are carried so that there is an option of tying boats together for more stability. Participants are encouraged to manage group distance and to show raft up sign if the group gets too far apart. Participants are briefed on capsize procedures. Maintain a distance from the shoreline that students can cover in severe wind conditions. Review weather conditions prior to the activity. Assess students' ability to cope with increasingly difficult wind conditions. www.bom.gov.au/qld . Or http://www.eldersweather.com.au/qld/darling-downs/geham Identify access points on the shoreline. Constantly monitor distance from shoreline	
Rain	Wet Equipment Hypothermia	S	Review weather conditions prior to the activity. www.bom.gov.au/qld . Or http://www.eldersweather.com.au/qld/darling-downs/geham Pre-briefing and equipment list outlines appropriate clothing and wet weather gear. Participants are shown how to waterproof equipment. Group condition is monitored closely during wet weather	L
Bushfire	Burns, Smoke Inhalations and death	H	Participants advised on appropriate clothing and equipment. Participants carry minimum of 3L water. Encourage peer reminders and monitoring. Review weather conditions prior to the activity. www.bom.gov.au/qld . Or http://www.eldersweather.com.au/qld/darling-downs/geham Aggressive heat waves are an indication of thinking about bush fire management strategies or cancellation. Fires may only be lit in specified areas. Fires should not be lit in windy conditions. Participants will	L

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			be briefed on emergency procedures.	
Submerged Logs	Capsizing Impact Injuries Canoe Damage	M	Participants are briefed about the presence of submerged items. Participant behaviour is monitored around areas where submerged logs are prevalent. All Participants are to wear activity specific safety equipment (PFD/Life Jacket.) Participants are briefed on capsize procedures	L
Dead Trees	Impact Injuries	M	Participants are briefed about the dead trees and the likelihood of tree fall if a raft hits. Participants are asked to care for equipment	L
Steep Banks	Sprains and Strains	M	Appropriate exits and entry points are chosen to avoid any difficulties. Use Campsite boat ramp and developed entry and exit points.	L
Rubbish	Cut Feet Embedded Objects	S	Participants to be wearing enclosed shoes at all time.	L
Wildlife		S	Participants are expected to wear closed in shoes at all times. Appropriate pathways are chosen to avoid potential wildlife Participants will be instructed to be aware of the ground underfoot, & to avoid walking through unmown areas & to be aware of trees, branches & brambles which may be home to various wildlife, & not to run. pathways are kept clear and mowed to ensure all wildlife can be seen and avoided. Participants will be instructed to give all wildlife a wide berth to avoid injury. Staff will inspect all activity areas prior to use to ensure no wildlife is in close proximity	L
People.				

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Swimming	Submerged Objects Spinal Injuries Drowning	H	Participants are expected to wear shoes and PFD's whilst swimming. Before entering the water the area should be assessed for hazards such as submerged logs or tree roots. The participants' medical form indicates whether they are confident to swim 50m which gives an indication of swimming ability. All Participants are to wear activity specific safety equipment (PFD/Life Jacket.) Safety guidelines should be set according to the area e.g boundaries Swimming is to be supervised by an Camp Cooby Staff member with appropriate qualifications e.g bronze medallion. No jumping or diving from jetties, banks or trees.	L
Water Consumption	Participants consume dam water resulting in stomach upsets	M	Participants will be briefed on the risks of swallowing dam water. All Participants are to wear activity specific safety equipment (PFD/Life Jacket.)	L
Raft collision	Finger injuries Paddle impact Damaged Equipment	S	Participants to be briefed in control strokes of canoeing (steering, emergency stops). Participants briefed on letting occupants of other rafts know if they are likely to hit their canoe	L
Motorized Craft	Capsize collision	S	Set expectation of group traveling together. Participants are empowered to manage group distance and to show raft up sign if the group gets to far apart. Set safety guidelines- distance between rafts, whistles, rafting up. All Participants are to wear activity specific safety equipment (PFD/Life Jacket.) Group should travel together so that motorized craft has space to manoeuvre. Group to travel close to banks where possible. Participants are briefed on capsize procedures.	L
Public	Will Reputation tarnished	S	Instructors should choose appropriate areas to brief and unload equipment so that public are not restricted in access and participants are not distracted. Instructors to monitor noise and behaviour of group.	L

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Inexperienced	Capsize and entanglement	H	Teach students the capsize drill in the water. Each student to practice capsize drill in the water. Close supervision of craft if they capsize. Rescue craft readily available at all times. (This may be the instructor's canoe/kayak.)	L
Poor Technique	Poor lashing techniques, Rope Burn	M	Pre-activity planning will consider whether the planned challenge session matches the maturity and abilities of the group. Participants will be briefed on the risks associated with the activity. Staff will ensure safety procedures are met and will cease any ideas which may result in a participant's safety being jeopardised. Participants will be shown correct lashing techniques in activity brief.	L
Poor Technique	A participant falls / trips resulting in injury. Participant trips with wooden pole	M	Pre-activity planning will consider whether the planned challenge session matches the maturity and abilities of the group. Participants will be briefed on the risks associated with the activity. Participants will wear firmly fitting, covered footwear with a non-slip sole. Staff will ensure safety procedures are met and will cease any ideas which may result in a participant's safety being jeopardised. Participants will not to run while completing activity.	L
Inconsiderate Participants	Participants being inconsiderate of other participants resulting in soft tissue, skeletal or emotional injury / damage	M	Participants will be briefed on the risks associated with the activity. Inconsiderate participants will be removed from the activity. Staff will ensure safety procedures are met and will cease any ideas which may result in a participant's safety being jeopardised.	L
Allergies	Environmental triggers (pollens, dust)	H	Check medical information, be aware of possible triggers.	L
Equipment				

Faulty Equipment	Leaky Barrel Splintered Pole	S	General condition of equipment is monitored when loading and unloading and faults recorded. Equipment condition is checked yearly. All Equipment is to comply with workplace health and safety and condition is checked before and after every activity.	L
Trailer	Equipment coming free from trailer Trailer coming off car	M	Suitably skilled adults are responsible for tying on equipment. The driver should check that equipment securely on the trailer before driving away. The driver is responsible for checking that the trailer is sitting on the tow ball correctly and that the safety chain is secured	L
Incorrect use of equipment	Failure to follow activity guidelines	M	Clear instruction about how to complete activity correctly.	L

Consequence					
Likelihood	Insignificant 1	Minor 2	Moderate 3	Major 4	Catastrophic 5
A (almost certain)	S	S	H	H	H
B (Likely)	M	S	S	H	H
C (Moderate)	L	M	S	H	H
D (unlikely)	L	L	M	S	H
E (rare)	L	L	M	S	S

Risk Level

H – High risk: e.g. likely or almost certain to occur, with at least moderate consequence – at least medical treatment required (See table below)

S – Significant risk

M – Moderate risk

L – Low risk

CONSEQUENCE RATING TABLE		
1	Insignificant	No injuries, No financial loss
2	Minor	First Aid treatment, Low financial loss
3	Moderate	Medical treatment required, Medium financial loss
4	Major	Extensive injuries, High financial loss

5	Catastrophic	Death, Major financial loss
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