Katmai NM Files

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Field Trip Report for October 1967

FOREWORD

Thomas Atwood, Chief Ranger, Katmai National Monument; Robert Haferman, Park Engineer, Mount McKinley National Park and Katmai National Monument; and R. F. Brunson, Project Supervisor, DCSSC participated in a three-day orientation visit and subsequent discussions concerning proposed construction work at Brooks Camp Area, Katmai National Monument.
I. General

The following items of interest are of a general nature concerning Katmai, King Salmon, and the surrounding area.

1. The Naknek River from Bristol Bay to Naknek Lake and thus to Brooks Camp can be negotiated during high river in June and July by a boat with $3\frac{1}{2}$ foot draft and a speed of at least 10 knots; however, contractor's materials may be best be unloaded at Naknek, freighted overland, and re-loaded onto a barge on Naknek Lake. In other words, getting construction materials to the job site will be difficult and expensive.

2. Violent storms with winds of 70 to 80 MPH and more can arise on Naknek Lake within only a few minutes.

3. The Bureau of Sports Fisheries and Wildlife and the Bureau of Commercial Fisheries have indicated their willingness to participate with the Park Service locally in the day labor construction of docking facilities in the Brooks Camp Area.
II. Mortuary Cove

An on-site examination and discussions revealed the following facts of interest concerning Mortuary Cove.

1. The cove, itself, is protected at virtually all times from high winds and rough water.

2. Ice flows are not a problem in the cove.

3. The water level varies approximately 2'-6' yearly with a high in late June or early July, a 1 foot fall by late August and another foot or more during the fall and winter, with the lowest level in May.

4. Since the water level varies less than 2 feet during the heaviest use months, June through August, permanent timber piers and boat slips constructed of hand-driven vertical timbers, faced and decked, or earth filled timber cribbing which is the predominant type of construction in the King Salmon Area may be more feasible than driving piling and constructing floats.

5. The east side of the cove appears to offer the best location for pier and harbor construction, fuel storage, and road approach to the cove.
6. The south end of the cove has a sandy beach with a 10 percent underwater ground slope which would be an acceptable beaching area for light aircraft. All that would be needed for mooring would be a series posts near the edge of the water with a 50' c/c spacing.

Beaching light aircraft on a sandy beach free from large stones is prevalent in the area and is preferable to side mooring at a float or pier since leaky or damaged pontoons are common and since beaching or getting the aircraft out of the water is fairly easy on a sandy beach.

Mooring is also easier since the danger of waves from other craft, etc., bumping the pontoons, fuselage, or wings against and fixed pier is eliminated. The pontoons themselves serve as access from the aircraft to the beach, even during beaching or mooring operations.

7. Mortuary Cove provides a remote area for eliminating boats, light aircraft, fuel, and freighting from the immediate Brooks Camp Area.
III. Disadvantages of Mortuary Cove

1. As mentioned under II (7) above, Mortuary Cove provides a means of removing craft and fuel storage from the immediate Brooks Camp Area, which presents several operational problems.
   a. Fuel would have to be re-handled by filling 50 gallon drums and hauling the drums by boat or vehicle to the camp area or to the east side of Brooks River.

b. When a boat was needed at Brooks Camp, a trip would be necessitated to Mortuary Cove to bring the boat to the camp area, then the boat would have to be returned after use.

c. A separate and costly water system would be required at Mortuary Cove for the personal convenience of visitors arriving there and for NFS and concessioner personnel who would spend considerable time in the area as well as for fire protection which should be provided in a boat and airplane harbor.

d. Visitors arriving during any of the long hours of day light during the peak season would require transportation to the camp area. A vehicle and a driver would have to be on call for over 20 hours per day.

e. The convenience of the arriving visitor, delivering freight which would be much more easily unloaded directly at the camp
area, as well as providing a fixed pump in the Brooks Camp Area for unloading diesel to the proposed generator house as called for by the PCP would apparently require duplication of docking facilities at Mortuary Cove and Brooks Camp.

f. The jeep trail to connect Mortuary Cove with the camp area would also present problems. Unless the proposed footbridge over Brooks River is constructed to accommodate a truck and the road grader and unless an emergency access road through the camp area is constructed, heavy vehicles (cars, pickups, etc.) could not use the jeep trail to Mortuary Cove since there would be no way to maintain the road without the duplication of maintenance equipment and storage with one set on each side of the Brooks Camp Area. If Mortuary Cove is developed, the problem of the maintenance of the jeep trail could be alleviated by the use of a small tractor-type vehicle using a trailer for freight and fuel drums and a special four-wheeled trailer with seats for passengers. An unobtrusive route for this vehicle through the camp area has tentatively been selected, following a proposed water line clearing.

2. Another advantage of Mortuary Cove other than for remote storage is its calm, safe harbor even during relatively high winds. However, again there are some distinct disadvantages:

a. During brisk or high winds the water just outside of Mortuary Cove is rough and the cove is inaccessible by smaller boats, and dangerous for larger boats. In
comparison, the lake adjacent to Brooks Camp Area is calmer at all times. In other words, the lake water near the camp can be used for small boats approximately 25 percent of the time when the water near Mortuary Cove is too rough.

So, when a boat is needed at the camp area, in addition to the inconvenience of going to Mortuary Cove to obtain the boat, it will be often impossible to bring the boat from the cove.

b. Nearly all visitors to Brooks Camp arrive by NCA amphibious aircraft, which are best loaded and unloaded with passengers and freight while on land. At Mortuary Cove, some clearing will be required to provide for a two-plane ramp, which is needed. Again, rough water will preclude the landing of the planes near Mortuary Cove or even their landing near Brooks Camp Area and taxiing to the cove many times during the season when the planes can safely land adjacent to Brooks Camp.

Of course, a landing ramp or float could be provided at Mortuary Cove with emergency landing on the beach at the camp as is currently practiced; however, the inconvenience of the rehandling of freight and the transportation of passengers from Mortuary Cove to the camp area by the concessioner will require the NFS to force the concessioner to use the cove when possible.
IV. Alternate to Mortuary Cove

1. Fuel Storage. It would be convenient for the park to haul a season's supply of one type of fuel on one barge trip to Brooks Camp. Numerous small shipments are impractical. The park staff anticipates that minimum required fuel storage in a tank farm should be as follows: a 4,000 gallon diesel tank for the generator house, a 2,000 gallon stove oil tank, a 2,000 gallon gasoline tank, and 2,000 gallon gasoline and stove oil tanks for the concessioner.

Since the PCP calls for a fixed pump to deliver fuel to a tank at the proposed generator house, all the fuel storage tanks could be buried in a tank farm near the proposed generator house. This would allow all fuel to be pumped from the barge at one mooring site. The best location for the powerhouse appears to be between the NPS living quarters and the shore. There will be enough tree cover to hide the generator house from the shore.

An earth-filled timber crib or a low, unobtrusive pier on the lake shore could serve several purposes. One would be for the unloading of fuel which is a requirement of the PCP. Another would be the unloading by pumping of the other fuels for storage.
The proposed location of the pier crib is in the present NPS freight unloading area near the NPS warehouse; therefore, this proposed pier could serve as an NPS freight dock. Also, since the gasoline storage fill lines will be on the pier, this could also be the location for boat fueling with NPS and concessioner dispensers.

The oil and gashouse could be conveniently located along the existing road from the shore to the present warehouse.

There should also be another fuel storage area east of Brooks River for the NPS road grader and the concessioner's bus. This could best be accomplished by using a barrel rack which could be concealed with in a fenced area or a barrel-house near the present equipment storage area.

Another solution would be to bury two 2,000 gallon tanks; one for concessioner use and one for NPS use. The tanks could be equipped with hand pumps which could eliminate the need for barrel storage.

2. Boat Docking. The alternate scheme to using Mortuary Cove is to enlarge the present boat slip beside Brooks River. A 20-foot widening in addition to the existing 50-foot slip width would provide ample room for maneuvering of 20 to 30-foot skiffs. An inexpensive pier or landing platform could be constructed of decked and faced hand-driven vertical timbers or of timber
cribbing. This landing could extend along the river-bar side of the slip for a distance of 200 feet, which should provide ample space for several boats. This addition to a relatively well-hidden facility should not be objectionable or obtrusive.

Another timber-crib dock approximately 100 feet long could be built on the other side of Brooks River from Brooks Camp. This side near the mouth of the river is approximately 6 feet deep, only 10 feet from the bank. A pier or landing in this area would serve several purposes:

a. A dock for larger or tour boats.

b. A freight pier, which is needed to unload fuel for the NPS road grader and the concessioner's tour bus.

c. The Fish and Wildlife use this area now for unloading freight for their camp on Brooks Lake.

So, a dock is needed at this point for freight and fuel even if another dock is constructed at Mortuary Cove. This facility would probably be somewhat obtrusive since it can be seen from the proposed footbridge.

As previously mentioned, boat fueling would be accomplished at the proposed fuel and freight dock near the NPS area, which is several hundred feet from the camp area and should not be too much of an infringement on the view from the camp area.
2. Seaplane Facilities. A concrete ramp and landing which will accommodate two large amphibious aircraft could be built on the shore near the NFS headquarters building. Even though this will place arriving visitors, freight, and luggage 300 feet from concessioner's camp headquarters, there are several advantages to this location as listed below:

a. It will provide for visitor contract with the NFS for orientation information and registration immediately upon arrival.

b. It will remove aircraft and noise from the immediate concessioner's area.

c. It would be near the boat fueling dock and the proposed gas and oil storage shed where the concessioner could store aviation fuel, thereby eliminating the need to provide duplicate storage sheds.

d. A concrete ramp and landing, flush with the beach would be unnoticeable from a short distance away.

Since Brooks Lake is nearly always calm, the amphibious planes can land there very often when Naknek Lake near Brooks Camp is too rough. Some facility should be provided there, also. It is suggested that a concrete
ramp to accommodate one amphibious aircraft be provided on the shore of Brooks Lake at the location of the Fish and Wildlife camp. Needless to say, Fish and Wildlife also need and could use this ramp.

Lighter, pontooned aircraft could use the outside of the boat slip near the mouth of the river for tying up on the sand. The wind could then only blow across the narrow neck of land tending to push or blow the aircraft away from the beach so that small, low posts on the beach would be adequate for mooring and no facility for tying-up would be required in the water.
V. Sewer System

Brooks Camp is situated on a narrow neck of land bordered on one side by the lake and on the other by a marsh. Since the ground is too flat to allow adequate fall for long sewer lines, it is recommended that two septic tanks with leach fields be built. One in the concessioner's area, near the present tent No. 19, and one in the NPS freight unloading area. A bury of 2 to 2½ feet is suggested, with excavation by hand or equipment of limited size, since deep excavation or large equipment would greatly mar the camp area.
VI. Water System

A gravity system supplied from a reservoir approximately 1,800 feet from the concessioner's lodge would be very expensive. Fire protection could be provided by placing a pump or pumps on or near the proposed fuel pumping dock in the present NPS freight unloading area. The lake being very near could serve as an inexhaustible, convenient reservoir. The pipelines for fire protection could be laid along the existing trail connecting the concessioner's area to the campground with one line to the concessioner's motel-type units and one line to the NPS area. Fire hydrants along the edge of the trail would be within the necessary distance to all other structures.

Since the water table is high, domestic water could be provided by a shallow well (20 ft. deep) in conjunction with a pressure tank. The pressure tank could be large enough to provide a few minutes of a fire emergency flow while the fire system is activated. Since all of the structures are pan-abode, any fire would be directly accessible to a water stream since there are no double walls.

Since the NPS area has early and late use (mid-October this fall), the NPS area should have insulated lines for at least a portion of the system with an arrangement of bleeding hot water into the system.
VII. Jeep Trail

The main disadvantage in having a jeep trail to Mortuary Cove is in the maintenance of the trail. Some means of transporting or driving maintenance equipment from the east side of Brooks River to the trail should be provided. It is proposed that a wide trail which will cover the fire protection water line along the concession area to campground existing trail be extended to near the present boat dock and to the bridge site. This would be an unobtrusive route.
VIII. Opinions and Conclusions

Most of the facilities programmed are needed in the immediate Brooks Camp Area and could be placed there without being unsightly. A jeep trail to Mortuary Cove would provide access to the cove where excess boats and pontoon aircraft that could not be accommodated at Brooks Camp could be stored or beached. An inexpensive pier for docking of large boats could be also be built at Mortuary Cove Barges, and the concessioner's tour boat could be docked there.

If future camp development requires additional storage and boat docking facilities, then Mortuary Cove could be used.