UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 8, MONTANA OFFICE
FEDERAL BUILDING, 10 W. 15th STREET, SUITE 3200
HELENA, MONTANA 59626

STATEMENT OF BASIS

PERMITTEE: Symes Hot Springs Hotel and Mineral Baths

FACILITY: Symes Hot Springs Mineral Baths and Swimming Pool

PERMIT NO.: MT0030619

RESPONSIBLE OFFICIAL: Leslee Smith
P.O. Box 651
208 Wall Street
Hot Springs, MT 59845

PERMIT TYPE: Minor Industrial, Indian Country, New

RECEIVING WATER: Roadside Ditch Draining to Hot Springs Creek

LOCATION: NE ¼ of Section 4, Township 21N, Range 24 W
Hydrologic Code 17010210, Lower Flathead River
Latitude 47º 36′ 37″
Longitude 114º 40′ 17″

A. Permit Status

The Symes Hot Springs Hotel and Mineral Baths (facility) is located on the Flathead Reservation and is in "Indian Country" as defined in 18 U.S.C. 1151. The Environmental Protection Agency (EPA) issued a permit to the facility, effective August 1, 2006. The permit expires on June 30, 2011. The facility submitted an application for renewal of the permit on January 15, 2011. The 2006 permit will remain in effect until the new permit is issued.

B. Facility Description

The Symes Hot Springs Hotel and Mineral Baths are located in the NE ¼ of Section 4, Township 21 N, Range 24 W, and the discharge is located at latitude 47º 36′ 37″, longitude 114º 40 ′ 17″. The mineral baths are supplied by water from a 280 feet deep geothermal well. Water from the well is approximately 109° to 115° F. Water from the well first enters a small top pool. The small top pool flows over a short cascading waterfall to a larger bottom pool. The top pool is maintained at approximately 104° and the bottom pool at approximately 101° F. Water in the bottom pool is recirculated through a sand filter and ozoneator in a neighboring shed before

discharge through an overflow structure. A 20′ by 40′ swimming pool also discharges water. When the previous permit was issued in 2006, the bottom pool and the swimming pool were chlorinated. The facility no longer used chlorination.

The discharge runs through approximately 100 feet of buried 4 inch PVC pipe under the front lawn and discharges into a ditch beside Wall Street. The ditch then runs approximately 30 feet in the open along Wall Street and then goes underground again for approximately 200 feet to Hot Springs Creek. The discharge, along with any storm water run-off carried by the ditch, then empties into Hot Springs Creek under the Wall Street Bridge. The facility has consistently reported discharge flow as 25 gallons per minute (0.036 million gallons per day) year-round.

C. Past Discharge Data

Table 1: Discharge Data, 2006-2010

Parameter	Units	2006 Permit Limit	Minimum Value	Maximum Value	Average Value	Number of Samples
Flow	mgd	--	.036	.036	0.036	--
Total Suspended Solids	mg/L	30/45[(1)]	0.5	3.0	0.95	46
Total Residual Chlorine	mg/L	0.011/0.019[(1)]	0.02	0.06	0.05	20
Fecal Coliforms	# organisms/ 100 ml	--	0.5	184	15	46

[(1)] 30-Day Average/7-Day Average

D. Compliance

As shown in Table 1, there have been no exceedances of permit limitations. An inspection conducted by EPA in April 2009 showed the permittee in compliance with the permit.

E. Technology Based Effluent Limitations

EPA has not promulgated effluent limitation guidelines for this type of discharge. However, best professional judgment (BPJ) indicates that the sand filter should be able to meet a 30-day average of 30 mg/L and a 7-day average of 45 mg/L for Total Suspended Solids (TSS).

F. Water Quality Considerations

1. Water Quality Classification

Hot Springs Creek is classified C-3. Waters classified C-3 must be maintained suitable for bathing, swimming and recreation; wildlife (birds, mammals, amphibians and reptiles): the marginal growth and propagation of non-salmonid fishes and associated aquatic life; and agricultural and industrial water supply purposes.

2. Receiving Water Flows

There is no flow data available for Hot Springs Creek at the point the discharge from the Symes mineral baths and swimming pool enters it. When the facility was visited in September of 2005, there was no flow in Hot Springs Creek upstream of the discharge.

4. Total Residual Chlorine

Chlorine is no longer used at the facility. The limitations for total residual chlorine have been removed from the permit.

5. Fecal Coliforms and E-Coli

The Tribal Water Quality Standards (WQS) contain standards for both E. coli and fecal coliforms. According to the WQS, the geometric number of E. coli may not exceed 126 colony-forming units per 100 ml during any 30-day period, and ten percent of the samples may not exceed 252 colony forming units per 100 ml during any 30 day period. The geometric mean number of organisms in the fecal coliform group must not exceed 200 per 100 milliliters, and 10 percent of the total samples during any 30-day period are not to exceed 400 fecal coliforms per 100 milliliters.

The facility ceased chlorinating in October 2009. Since that time, the maximum number of fecal coliforms in the effluent was 83 cfu/100 ml. There is no need for a fecal coliform limit in the permit. Monitoring for fecal coliforms will be required. Due to the low numbers of fecal coliforms present in the discharge, EPA believes that monitoring only for fecal coliforms will protect the designated use.

G. Effluent Limitations

The effluent limitations and the basis for the limitations are given in the table below:

Table 2: Effluent Limitations				
	Effluent Limitation			
Effluent Characteristics	30-Day	7-Day	Daily Maximum[1]	Basis[1]
Total Suspended Solids, mg/L	30	45	N/A	BPJ
The discharge shall only be overflow from the mineral baths and the discharge from the swimming pool. There shall be no discharge of filter backwash, wastewater from the cleaning of the pools, or sanitary waste.[2]				

[1] "BPJ" refers to best professional judgment. "WQS" refers to effluent limitations based on water quality standards.

[2] These sources of wastewater were not included in the permit application as sources of wastewater for this facility. The effluent limitations are based on these wastes not being present.

H. Self Monitoring Requirements

Monitoring for flow, TSS, and fecal coliforms will be for the duration of the permit. Flow measurement and samples will be taken at the point where the 4 inch pipe leaves the Symes property.

Table 3: Monitoring Requirements		
Effluent Characteristic	Frequency	Sample Type[1]
Total Flow, gallons per day	Monthly	Instanteous
Total Suspended Solids, TSS, mg/L	Monthly	Grab
Fecal Coliform, # org/100 mL[2]	Monthly[2]	Grab

[1] See Definitions, Part 1.1 of the permit, for definition of terms.

[2] Monitoring for fecal coliforms is required year round.

I. Endangered Species Act (ESA) Requirements

Section 7(a) of the Endangered Species Act requires federal agencies to insure that any actions authorized, funded, or carried out by an Agency are not likely to jeopardize the continued existence of any federally-listed endangered or threatened species or adversely modify or destroy critical habitat of such species.

According to the U.S. Fish and Wildlife Service, Montana Field Office, internet site at http://www.fws.gov/mountain-prairie/mt.html, Table 6 lists the federally listed threatened, endangered and candidate species and proposed and designated critical habitat found on the Flathead Reservation in Montana.

Table 4: Threatened, Endangered, and Candidate Species on the Flathead Reservation

Common Name	Scientific Name	Status	Habitat
Gray Wolf	*Canis lupus*	Endangered	Resident, transient; Forests in western Montana
Bull Trout	*Salvelinus confluentus*	Threatened; Proposed Critical Habitat	Clark Fork, Flathead, Kootenai, St Mary, and Belly River basins; cold water rivers and lakes.
Grizzly Bear	*Ursus arctos horribilia*	Threatened;	Resident, transient; Alpine/subalpine coniferous forest
Canada Lynx	*Lynx canadensis*	Threatened;	Resident; western Montana-montane spruce/fir forests
Spaldings's Campion (or "catchfly")	*Silence spaldingii*	Threatened	Upper Flathead River Fisher river drainages; Tobacco Valley – open grasslands with rough fescue or bluebunch wheatgrass
Water Howellia	*Howellia aquatilis*	Threatened	Wetlands; Swan Valley, Lake and Missoula Counties
Wolverine	*Gulo gulo luscus*	Threatened	High elevation alpine and boreal forests that are cold and receive enough winter precipitation to reliably maintain deep persistent snow late into the warm season

EPA finds this permit is Not Likely to Adversely Affect any of the species listed by the US Fish and Wildlife Service under the Endangered Species Act. The finding is based upon the following: (1) the renewed permit is for an existing facility; (2) the renewal of this permit does not allow for any increase in effluent limitations over the previous permit; (3) The facility does not provide any habitat for any of the endangered, threatened, or candiatdate species listed in Table 4.

J. National Historic Preservation Act (NHPS) Requirements

Section 106 of the National Historic Preservation Act (NHPA), 16 U.S.C. § 470(f) requires that federal agencies consider the effects of federal undertakings on historic properties. EPA has evaluated its planned reissuance of the NPDES permit for the Facility to assess this action's potential effects on any listed /eligible historic properties or cultural resources. EPA does not anticipate any impacts on listed/eligible historic properties or cultural resources because this permit is a renewal and will not be associated with any new ground disturbance or changes to the volume or point of discharge. In addition, issuance of this permit allows the Hotel, built in 1930, and Mineral Baths to continue its historic business.

K. Total Maximum Daily Load

On June 21, 2000 and September 21, 2000, U.S. District Judge Donald W. Molloy issued orders stating that until all necessary total maximum daily loads (TMDLs) under Section 303(d) of the Clean Water Act are established for a particular water quality limited segment, the EPA is prohibited from issuing new permits or from increasing already permitted discharges under the NPDES program. (The orders were issued pursuant to the lawsuit Friends of the Wild Swan, et al., v. U.S. EPA, CV 97-35-DWM, District of Montana, Missoula Division.)

EPA finds that the issuance of this permit would not conflict with the order because the receiving water is in Indian Country. Although the Confederated Salish and Kootenai Tribes have adopted water quality standards that have been approved by EPA, they have not listed water bodies as impaired and developed a 303(d) list to require development of TMDLs. Hot Springs Creek was listed as impaired on the State of Montana's 1996 303(d) list. However, when EPA approved the State of Montana's 1996 and 1998 lists of impaired streams and lakes which included water bodies within tribal reservation boundaries, EPA specifically stated that the approval did not extend to waters in Indian Country. If a future load allocation is set for any parameter which could apply to the Symes Hot Springs mineral bath and swimming pool discharge, the permit contains a provision that would allow the permit to be reopened and modified to include any Waste Load Allocation developed by the Confederated Salish and Kootenai Tribes and/or EPA.

L. Miscellaneous

The effective date of the permit and the permit expiration date will be determined at the time of issuance. The permit will be issued for a period of approximately five years but not to exceed five years.

Prepared by Rosemary Rowe
April 14, 2011