Ruby Hydrokinetic

Grantees Yukon River Inter-Tribal (Local Government)

Technology Type OCEAN/RIVER

Region Yukon-Koyukuk/Upper Tanana

AEDG Project Code 10084

REF Grants Received

| Round | App | Grant Title | Grant # | AEA Project # | Phase | Start Date | End Date | Status |
|-------|-----|-------------------|---------|----------------------|-------------|------------|-----------------|--------|
| 1 | 84 | Ruby Hydrokinetic | 2195402 | 407050 | Feasibility | 8/20/08 | 6/30/11 | Closed |

Grant 2195402: Ruby Hydrokinetic

Project Scope: The Yukon River Inter-Tribal Watershed Council (YRITWC) planned to expand on the hydrokinetic project it operated in Ruby in 2008. In 2009 the YRITWC planned to redeploy the 5kW hydrokinetic turbine used in 2008 in an effort to gain additional information for a revised resource assessment. To accomplish this there was a redesign of the turbine deployment (anchoring and debris diversion). The plan was to then to deploy a 25kW version of the hydrokinetic turbine in 2010 for study and analysis.

Project Status: The hydrokinetic project in Ruby was a small one time conceptual test. The turbine was installed, produced a small amount of power and removed within the same season. The project was a first of its kind in Alaska. The project revealed hydrokinetic deployments in Alaska rivers can be challenging.

| As of Nov. 30, 2013 | Budget | Expenditures |
|----------------------------|--------------|--------------|
| Renewable Energy Funding | \$189,335.06 | \$189,335.06 |
| Other State Funding | \$0.00 | \$0.00 |
| Total State | \$189,335.06 | \$189,335.06 |
| Required Local Match | \$6,600.00 | \$6,600.00 |
| Federal Grant Funding | \$0.00 | \$0.00 |
| Total Project Costs | \$195,935.06 | \$195,935.06 |