## WATER TRANSFER WORKING GROUP PROJECT DESCRIPTION

APPLICATION NO./COURT CLAIM NO.		
YAKI-15-06 (CG4-28991C)		
APPLICANT NAME	CONTACT NAME	TELEPHONE NO.
Borton & Sons, Inc (Borton)	Malcom Hanks	(509) 945-3717
WATER RIGHT HOLDER'S NAME (if different)	EMAIL	
		malcolm@bortonfruit.com

August 13, 2015	Jun 26, 1986
DATE OF APPLICATION	PRIORITY DATE

WATER SOURCE:	CROP:	
Well	Alfalfa	
INSTANTANEOUS QUANTITY:	ANNUAL QUANTITY:	
200 gpm	160 ac-ft/yr	
PERIOD OF USE:		
April 1 to October 31		
PLACE OF USE:	PURPOSE OF USE:	
NW1/4 SW1/4 of Section 2, Township 12 N.,	Irrigation of 40 acres	
Range 18 EWM		
IRRIGATION METHOD:		
Handlines with impact sprinklers		

## CONSUMPTIVE USE CALCULATION:

Per the WIG, the irrigation requirement for 40 acres of alfalfa is 117.7 ac-ft/yr. This puts the application efficiency rate at 74%, which is consistent with Ecology's GUID-1210 estimates for hand-line sprinklers. GUID-1210 estimates approximately 10% of water applied to a crop with hand-lines is lost to evaporation. When factoring in evaporative loss, the total consumptive use under G4-28991 is 134.4 ac-ft/yr ( $84\% \times 160$  ac-ft/yr).

## NARRATIVE DESCRIPTION OF PROJECT:

Borton is building a fruit packing and storage facility. In support of this effort, Borton is requesting several changes to this water right:

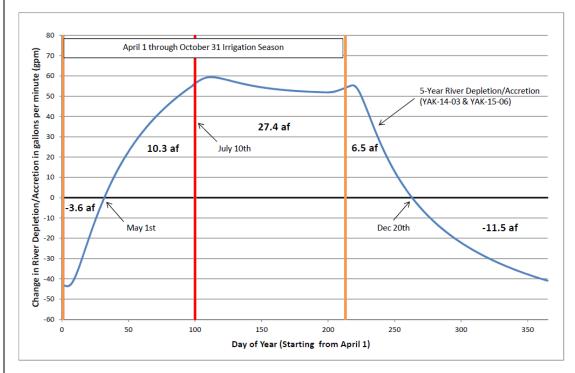
- 1. Add industrial uses as a purpose of use (non-contact cooling and process wash water)
- 2. Extend the season of use to year round
- 3. Change the place of use to include additional lands owned by Borton (no increased acres)
- 4. Add a point of withdrawal

The additional purpose of use in non-consumptive in nature, and pursuant to a State Waste Discharge Permit, Borton plans to continue irrigating with blended wastewater from the facility.

Domestic water for the facility will be supplied by the City of Union Gap. As part of this agreement, Borton decommissioned four exempt wells and the City of Union Gap will be consolidating water withdrawn from these wells pursuant to RCW 90.44.105.

Under the proposed change the period of use would change from the April 1 to October 31 to span

the entire year. A river depletion analysis was conducted to consider the cumulative impacts of this application, YAKI-14-03 (a water right change tied to this project and approved by Yakima County Conservancy Board in September 6, 2016), and the consolidation of four permit-exempt wells from their current location adjacent to Ahtanum Creek to the union Gap wells adjacent to the Yakima River. Results of the analysis as depicted on the following map indicate that up to approximately 59 gpm and 44.2 acre-feet of flow benefit results from the proposed changes generally during the summer time when competition for flow in Ahtanum Creek is highest. Moreover, up to about 55 gpm and 6.5 acre-feet of the flow benefit occurs after the irrigation season when instream flows are near the seasonal low. However, up to 43 gpm and 15.1 acre-feet of depletion occurs during the winter and early spring (December 20 to May 1), including 3.6 acre-feet in the first month of the critical low-flow periods and average year-round flow. No impacts to the Yakima River or TWSA are predicted to occur.



Aspect Consulting
1/30/2017
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Figure 5
Cumulative River Depletion/Accretion
Hydrogeologic Investigation - Borton Packing Center, LLC

