# Before the Division of Water Resources Department of Public Works State of California

000

In the Matter of Application 10698 of Clarence H. Schneider to Appropriate from Middle Fork of Cotton Wood Creek, in Shasta County for Irrigation and Domestic Purposes.

000

Decision A. 10698 D. 518

Decided December 11, 1944.

000

APPEARANCES AT INVESTIGATION CONDUCTED AT THE SITE OF THE PROPOSED APPROPRIATION ON MAY 19, 1944 AND CONTINUED ON SEPTEMBER 18, 1944.

# For Applicant

Clarence H. Schneider

In propria persona

#### For Protestants

William H. and Helen E. Burch

In propria persona

## For Division of Water Resources

A. S. Wheeler, Assistant Hydraulic Engineer, for Harold Conkling, Deputy State Engineer in Charge of Water Rights, Division of Water Resources, Department of Public Works, State of California.

## <u>opinion</u>

#### General Description of Project

Application 10693 was filed with the Division on August 17, 1943. It proposes an appropriation of 1.0 cubic foot per second from the Middle Fork of Cottonwood Creek for the irrigation of 45 acres within Sections 17 and 20 T.29N R9W. M.D.B.M. from about April 1 to about November 1 of each season and throughout the year as required for domestic purposes. The point of diversion is described as being within the  $SW_4^1$  of  $NW_4^1$  of Section 19 T.29N. R9W. M.D.B.M.

At the proposed point of diversion applicant intends to construct a concrete dam, 4 feet in height and 40 feet long on top by means of which the water is to be diverted through 6500 feet of earth ditch to the place of use.

## Protest

William H. and Helen E. Burch claim a right to the use of the waters which applicant is seeking to appropriate based upon an appropriation initiated by their predecessors prior to the effective date of the Water Commission Act and allege in effect that during the summer months and first fall month, the flow in the creek is less than the amount of water which applicant is seeking to appropriate and that should Application 10698 be approved it would result in depriving them of the water to which they are entitled for irrigation and domestic purposes. Their intake is located within the  $SW_{4}^{1}$  of  $SW_{4}^{1}$  of Section 16 T.29N R9W. M.D.B.M. about 2 miles below the applicants' proposed point of diversion.

## Investigation

Stipulations under Regulation 12<sup>B</sup> of the Rules and Regulations of the Division of Water Resources having been signed by the applicant and the protestants and approved by this office, an investigation was conducted at the site of the proposed appropriation by an engineer of this office on May 19 and continued on September 13, 1944. Accompanying the engineer on May 19 was protestant William H. Burch, and on September 18, he was accompanied by applicant Schneider and protestant Helen E. Burch. In arriving at a decision in the matter, reliance is placed upon the entire file of Application 10698 and particularly upon an agreement between Mr. Schneider and Mrs. Burch at the time of the investigation on September 13, 1944.

## General Discussion

At the protestants' point of diversion on the Middle Fork of Cottonwood Creek, a dam has been constructed which serves two diversion systems, consisting of -

- (1) A gasoline motor driven Goulds rotary pump having a rated capacity of 28 g.p.m., which delivers water for domestic and garden irrigation at Platina, a small community center formerly known as Noble Station, which is in the immediate vicinity of the dam, and
- (2) A gravity diversion of approximately 2.0 cubic feet per second through about 200 feet of flume and 6500 feet of ditch to the Noble Ranch, where about 20 acres of grain and pasture are irrigated out of a total irrigable area of approximately 35 acres.

The conveyance losses through the ditch are unusually large due to the type of soil through which it is constructed, and the soil at both the protestants' and applicant's places of use is a gravelly, sandy clay loam which would require a duty of water somewhat lower than normal.

The applicant's dam site is located about 2 miles above the protestants' dam, and he proposes to divert the water through 6500 feet of earth ditch to his place of use, which would also result in a large conveyance loss.

At a point a short distance above the applicant's place of use, the creek emerges from a canyon and enters a rather extensive gravel deposit causing a continuing diminution of the surface flow, with the result that in the low flow period of August and September there is insufficient surface flow at protestants' intake to meet their requirements at the Noble Ranch, although the sub-surface flow might be sufficient for their needs. The protestants, during this low flow period, depend upon pumping from the sub-surface flow to meet their requirements at Platina, and they contend that diversion by applicant during that period would not only

eliminate all surface flow at their intake, but would so deplete the subsurface flow that there would not be sufficient water for their needs. Furthermore, as applicant proposed to construct his dam to bed rock, he would be in a position to take the entire low flow of the creek and, due to the high conveyance losses and field losses, it is not likely that there would be sufficient return flow to meet protestants' needs.

Under the present means of diversion and use by the protestants, and the diversion and use proposed by the applicant, it would appear that any diversion by the applicant from about July 15 to about September 30 might deprive the protestants of water to which they are entitled.

At the time of the investigation on September 18, 1944, the flow in the Middle Fork of Cottonwood Creek at the applicant's proposed point of diversion was estimated to be approximately 0.25 c.f.s. At the protestants' intake, there was no surface flow but there were some pools which were apparently fed by sub-surface flow. According to Mr. Burch, the surface flow diminished to such an extent by July 1 that it was not possible to convey the water through the entire length of the protestants' ditch, and by August 1 the surface flow had ceased altogether.

In order to eliminate excessive conveyance losses, both the applicant and the protestants agreed to install pumping plants on the creek at their respective places of use, which would be used at times of low stream flow, in order to conserve water which would otherwise be lost by evaporation and seepage in the ditches, but in order to reduce pumping costs, the gravity diversions and conduits would be maintained and used during periods of ample water supply. To this end, the applicant on September 28, 1944 filed a petition with the Division to add a point of diversion

within the  $SE_{4}^{1}$  of  $SE_{4}^{1}$  of Section 18, T.29N. R.9W. M.D.B.M.

Mrs. Burch insists that a special term or condition be inserted in any permit issued in approval of Application 10698, prohibiting applicant from diverting by gravity at such times as he may be operating his proposed pumping plant, and also from diverting by gravity during the months of July, August and September. To such limitations, applicant has agreed and therefore it is the opinion of this office that Application 10698 should be amended to conform to the petition filed September 28, 1944 to add a point of diversion, and that the application, as amended, be approved subject to such of the usual terms and conditions as may be appropriate and subject also to a special term and condition to the effect that simultaneous diversions shall not be made by permittee from the two points of diversion, and that the permittee shall not be permitted to divert by gravity during the months of July, August and September.

### ORDER

Application 10698 for a permit to appropriate water having been filed with the Division of Water Resources, as above stated, a protest having been filed, a field investigation by the Division having been made, a stipulated hearing having been held in accordance with Regulation 12B of the Rules and Regulations of the Division of Water Resources, and the Division of Water Resources now being fully informed in the premises:

IT IS HEREBY ORDEPED that Application 10698 be amended to conform to the petition filed on September 28, 19/4 to add a point of diversion to the one already named therein; and

IT IS FURTHER ORDERED that Application 10698 be approved and that a permit be granted to the applicant subject to such of the usual terms

and conditions as may be appropriate and subject also to the following special term or condition, to wit:

- (a) Permittee shall not divert water simultaneously from his upper and lower points of diversion.
- (b) Diversion from the upper point of diversion shall not be made during the months of July, August and September of each season.

WITNESS my hand and the seal of the Department of Public Works of the State of California, this llth day of December , 1944.

EDWARD HYATT, STATE ENGINEER,

Harold Conkling,
Deputy State Engineer.

