BEPORT OF A COMMITTEE OF THE WYOMING HISTORICAL AND GEOLOGICAL SOCIETY ON THE EARLY SHAD FISHERIES OF THE NORTH BRANCH OF THE SUSQUEHANNA RIVER.

By HARRISON WRIGHT, CHAIRMAN OF THE COMMITTEE.

Prof. SPENCER F. BAIRD,

United States Commissioner of Fisheries,

SIR: The committee of the Wyoming Historical and Geological Society, to whom your inquiries touching the old shad fisheries on the North Branch of the Susquehanna were referred for investigation, would respectfully report that they have interviewed, by letter or in person, a large number of the old settlers, who either now live or formerly did live near the banks of the river, and were calculated to be able to give the requisite information, and who were pleased to report. These persons have, in nearly every instance, most cheerfully and at no little trouble furnished us with the information asked. We make this acknowledgment for the reason that the parties to whom application was made are necessarily far advanced in age, all with but one or two exceptions having seen their "three score years and ten," and to them it was no little labor to write out their reminiscences of the early shad fisheries.

Besides these interviews, the records of the county, files of old newspapers, the numerous printed histories of this section of country, have been consulted, and from these various sources the data upon which this report is based have been gleaned. With these preliminary remarks let us proceed to our report.

HISTORY.

There can be no doubt but that the Indians, for years before the white people thought of settling at Wyoming, caught their shad there in large quantities; their net-sinkers, though they have for years been collected by archæologists, are still very plenty, and can be found anywhere on the flats along the river in quantities, and the fragments of pottery show unmistakable markings with the vertebræ of the shad; these, together with the fact that the early settlers saw the Indians catching shad in a seine made of bushes (called a bush-net), point to the fact that shad on the North Branch were taken in quantities by the Indians.

The Connecticut people who settled here over a hundred years ago had, in the very start, their seines, and took the shad in numbers; as near as we can learn they were the first white people who seined the shad in the North Branch.

During the thirty years' war which the Connecticut settlers had with the Pennsylvania government for the possession of this valley of Wyoming, the shad supply was a great element of subsistence; for this, unlike the fields, barns, and grainaries, could not be burned by the Pennamites. An old settler says: "When we came back to the valley we found every thing destroyed, and the only thing we could find to cat were two dead shad picked up on the river shore; these we cooked, and a more delicious meal was never partaken of by either of us." One of the most bitter complaints made against the Pennamites, in 1784, was that they had destroyed the seines.

After the Revolutionary war had ended, and the troubles between the Pennsylvania claimants and the Connecticut settlers had been quieted, the shad fisheries increased in numbers and value yearly, until about the year 1830, when the dams and canal were finished and an end put to the shad fisheries.

RUN.

It would appear, from the papers hereto attached, that the male fish preceded the female fish by some eight to ten days in their ascent of the river, and between the ascent of the former and that of the latter there was generally a preceptible rise in the river, and immediately following it came the large roe-weighted females in great schools.

FISHERIES.

Accompanying this report is a map of the Susquehanna River from the junction of the West Branch at Northumberland to Towanda near the New York State line; upon this is noted the localities of the fisheries with as much accuracy as was attainable from the accounts received by us. Some have probably been omitted, especially in the stretch of river from Danville to a point four miles above Bloomsburg, where we were unsuccessful in our inquiries, but without doubt the most important on the river have been recorded by us.

At Northumberland, or just below, was Hummel's fishery; between Northumberland and Danville there were eight fisheries in order from Northumberland up, as follows: 1. Line's Island lower fishery; 2. Line's Island middle fishery; 3. Smith's fishery; 4. Line's Island upper fishery; 5. Scott's fishery; 6. Grant's fishery; 7. Carr's Island fishery; The next fishery of which we have a record was the 8. Rockafeller's. fishery of Samuel Webb, located about four miles above Bloomsburg. Above this point about four miles, and six miles below Berwick, was the fishery of Benjamin Boon; the next was located just above the town of Berwick, and about a mile and a half above Berwick was the Tuckahoe fishery (this last is the same as the Nescopeck fishery mentioned in Pearce's history); the next was at Beach Haven. Between this latter place and Nanticoke Dam there were three, viz, one at Shickshinny; one just below the mouth of Hunlock's Creek, and one called the "Dutch" fishery on Croup's farm. Above Nanticoke there was one belonging to James Stewart, about opposite Jameson Harvey's place; one at Fish Island; and one at Steele's Ferry, called the Mud

fishery. The next was on Fish's Island, three-quarters of a mile below the Wilkes-Barre bridge; the next was Bowman's fishery, immediately below the Wilkes-Barre bridge; the next was the Butler fishery, a little above the bridge; the next was at Mill Creek, a mile above the bridge; the next was the Monacacy Island fishery; the next Carey's; the next was on Wintermoot Island, this last landing on the left bank above the ferry at Beauchard's; the next was at Scovel's Island, opposite Lackawanna Creek; this and the Falling Spring fishery next above belonged to parties living in Providence, away up the Lackawanna. The next above was at Harding's, in Exeter township; the next above was at Keeler's in Wyoming County; the next was at Taylor's (or Three Brothers) Island, this latter fishery was no doubt the one referred to by P. M. Osterhout as being opposite McKune's station on the Lehigh Valley Railroad; the next was at Hunt's ferry circa, five miles above Tunkhannock; the next was Grist's Bar, about a mile above Meshoppen; the next was at Whitcomb's Island, a mile below Black Walnut bottom: a half a mile above this fishery was the Sterling Island fishery: and the next above was Black Walnut, and half a mile further up was the Chapin Island fishery; the next was at the bend at Skinner's Eddy; the next was at Browntown, in Bradford County; the next was at Ingham's Island; the next was at the mouth of Wyalusing Creek; two miles further up was one at Terrytown; the next and last that we have any record of was at Standing Stone, about six miles below Towanda.

Thus it will be seen that between Northumberland and Towanda there were about forty permanent fisheries.

MONEY VALUE.

Our country records only go back to 1787. We spent a whole day in searching the first volumes, in hopes that we might find some entries of transfers of fishing rights, but our search was fruitless; we have, however, found among the papers of Caleb Wright a bill of sale of a half interest in a fishery between Shickshinny and Nanticoke, called the "Dutch fishery"; the price paid was £20 "lawful money of Pennsylvania," equivalent to \$53.33.*

Jameson Harvey says that Jonathan Hunlock's interest in the Hunlock fishery was worth from five to six hundred dollars per annum; it was a half interest. Henry Roberts says a right in a fishery was worth from ten to twenty-five dollars.

Major Fassett's father was one of eleven owners in the Sterling Island fishery, and his interest was valued at \$100.

Mr. Hollenback's information on the money value of the different fisheries is by far the most valuable; he says the Standing Stone fishery was worth from \$300 to \$400 per annun; the Terrytown fishery was worth about the same; the Wyalusing Creek fishery was worth about

^{7.} Caleb Wright's son received as his share of one night's fishing at this fishery 1,900 shad.

\$250 per annum; the Ingham Island fishery \$50 less; the Browntown and Skinner's Eddy fisheries about \$150 per annum each.

Jameson Harvey says: "The widow Stewart, at the Stewart fishery, used often to take from \$30 to \$40 of a night for her share of the haul."

The data bearing upon this point are decidedly unsatisfactory, as they would only give to the forty fisheries an annual value of about \$12,000, a large amount for those days, yet one we believe to be too small; the next item, the "catch," should be taken with this one to form a basis for calculation.

CATCH.

At the eight fisheries near Northumberland large numbers of shad were taken; three hundred was a common haul; some hauls ran from three to five thousand. The Rockafeller fishery just below Danville (about the year 1820), gave an annual yield of from three to four thousand, worth from 12½ cents to 25 cents apiece.

Mr. Fowler says that the fishery just above Berwick was one of the most productive; and that he has assisted there in catching "thousands upon thousands," but does not give the average annual yield; he also says, that at the Tuckahoe fishery "many thousands were caught night and day in early spring"; and at the Webb and Boon fisheries the hauls were immense; at the latter they got so many at a haul that they couldn't dispose of them, and they were actually hauled on Boon's farm for manure.

At Hunlock's fishery the annual catch must have been above ten thousand.

At the Dutch fishery in one night thirty-eight hundred were taken.

At the Fish Island fishery, at a single haul, nearly ten thousand shad were taken.

Mr. Jenkins recollects of seeing a haul at Monocacy Island-just before the dam was put in—of twenty-eight hundred.

At Scovel's Island the catch was from twenty to sixty per night; at

Falling Spring fifty to three hundred per night; at Taylor's Island from

two hundred to four hundred per night.

At Wyalusing the annual catch was between two and three thousand; and at Standing Stone between three and four thousand.

The daily catch at the Terrytown fishery was about one hundred and fifty.

Major Fassett says that at the Sterling Island fishery "over two thou-

sand were caught in one day in five hauls."

It is a plain deduction from the above facts that the fisheries down the river were much more valuable than those above. Above Monocacy we hear of no catch over two thousand, while below that point they were much larger, and while from three to four hundred dollars seems to be the general annual value above, we find the fishery at Hunlock's, 12 miles below, was worth from a thousand to twelve hundred per annum. The shad further up the river appear to have decreased in numbers yet to have increased in size, and that brings us to the next head.

SIZE.

The opinion seems to be general that the great size attained by the Susquehanna shad was attributed to the long run up the fresh-water stream (carrying the idea of the survival of the fittest); that they were of great size is beyond doubt, nearly every one who recollects them insists on putting their weight at almost double that of the average Delaware shad of to-day.

Mr. Van Kirk gives as the weight of the shad caught at the fisheries in Northumberland and Montour Counties as from three to nine pounds.

Mr. Fowler says he has assisted in catching thousands weighing eight and nine pounds at the fisheries in Columbia County.

Mr. Harvey, speaking of the Luzerne County shad, says: "Some used to weigh eight or nine pounds, and I saw one weighed on a wager which turned the scales at thirteen pounds!"

Major Fassett, speaking of those caught in Wyoming County, says: "The average weight was eight pounds, the largest twelve pounds."

Dr. Horton says of the shad caught in Bradford County, that he has seen them weighing nine pounds; ordinarily the weight was from four to seven pounds.

PRICE.

The price of the shad varied, according to their size, from 4d. to 25 cents, depending of course upon their scarcity or abundance, and as some of our correspondents remember the price in years when it was high, and others in those when there was a great plenty of fish, there arise what appear to be conflicting statements in their letters.

At the town meeting held at Wilkes Barre, April 21, 1778, prices were set on articles of sale, *inter alia*, as follows: Winter-fed beef, per pound, 7d.; tobacco, per pound, 9d.; eggs, per dozen, 8d.; shad apiece, 6d. At one time they brought but 4d. apiece. A bushel of salt would at any time bring a hundred shad.

At the time the dam was built they brought from 10 to 12 cents. On the day of the big haul Mr. Harvey says they sold for a cent apiece (Mr. Dana says 3 coppers).

Mr. Isaac S. Osterhout remembers a Mr. Walter Green who gave twenty barrels of shad for a good Durham cow.

Mr. Roberts says that in exchanging for maple sugar one good shad was worth a pound of sugar; when sold for cash shad were worth $12\frac{1}{2}$ cents apiece.

Major Fassett says the market price of the shad was \$6 per hundred. Dr. Horton says the shad, according to size, were worth from 10 to 25 cents.

Mr. Hollenback, in calculating the value of the fisheries near Wya-

lusing, has put the value of the shad at 10 cents apiece. In 1820 they were held in Wilkes Barre at \$18.75 per hundred. Mr. Fowler says they were worth 3 cents or 4 cents apiece.

COUNTRY SUPPLY AND TRADE.

Every family along the river having some means, had its half barrel, barrel, or more of shad salted away each season; and some smoked shad hanging in their kitchen chimneys; but not only those living immediately along the river were the beneficiaries, but the testimony shows that the country folk came from fifty miles away to get their winter supply, camping along the river's bank, and bringing, in payment, whatever they had of a marketable nature. They came from the New York State line, and from as far east as Easton, bringing maple sugar and salt, and from as far west as Milton, bringing cider, whisky, and the two mixed together as cider royal, and from down the river, and away to the south towards Philadelphia, bringing leather, iron, &c.

Mr. Isaac S. Osterhout says when quite a boy (1822-23) he went with a neighbor to Salina, N. Y., after salt, he taking shad and his neighbor whetstones, which they traded for salt. The teams hauling grain to Easton brought back salt; in good seasons the supply of this latter important item always seems to have been short of the demand.

The shad, as far as we can learn, appear never to have gone up the West Branch in such quantities as they did up the North Branch, and the same may be said of the Delaware, or else the fish were of inferior quality, for the dwellers from the banks of both of these streams came to Wyoming for their supply of shad.

Mr. P. M. Osterhout tells of a firm (Miller & McCord) living at Tunkhannock, which did quite an extensive business in shad, sending the cured ones up the river into New York State, and far down the river.

Mr. Fowler says, "No farmer, or man with a family, was without his barrel, or barrels, of shad the whole year round. Besides furnishing food for the immediate inhabitants, people from Mahantango, Blue Mountains, and, in fact, for fifty miles around, would bring salt in tight barrels, and trade it for shad."

Mr. Harvey says: "Boats coming up the river used to bring leather, cider, whisky, cider royal, salt, iron, &c., and would take back shad."

OTHER FISH.

We do not find that any other deep-sea fish (with the exception of eels) ever came up the river above Northumberland. The "Oswego Bass," "Susquehanna Salmon," "Yellow Bass," "Striped Bass," Susquehanna Bass" spoken of by the different correspondents appear to be the same fish, which is also sometimes called the wall-eyed pike; an excellent fish introduced into the river many years ago from Oswego Lake; they are not now as plenty as formerly, though within the past few years they have been increasing perceptibly. The other fish mentioned are nothing but the common river fish.

EFFECT OF DAMS.

There is no question that the building of the dams necessary to feed the canals put a stop at once to shad fishing; all our correspondents agree that after the Nanticoke dam was finished, in 1830, no shad were ever caught above it. As to the effect of the dams on the shad fishing, the following extracts from Hazard's Register are of interest:

1829. May 9, page 304. "Lewistown, Pa., May 2. It is stated that shad are caught in much greater abundance below the dam at North Island, in the Juniata, than has ever been known at any previous time. It is supposed that the dam in the Susquehanna, immediately above the mouth of the Juniata, has the effect of directing their course up the Juniata. The dam at North Island retards their further passage, and the consequence is that the people further up the Juniata are deprived of the luxury of fresh shad which so abundantly falls to the lot of their neighbors a few miles lower down. But we must be content with these little deprivations by the promise of the immense advantages which are to accrue to the country from the canal."

1830. May 8, page 304. The Sunbury Beacon of Monday the 26th of April, says: "Not less than from four to five thousand shad were caught on Saturday last within a quarter of a mile below the dam. Upwards of five hundred were taken by one dip-net, and several others averaged two and three hundred each. We understand that several hundred were caught with dip-nets yesterday."

1831. May 14, page 318. From the Wyoming Herald: "Wilkes Barre, May 6, 1831. While the raftsmen complain of the Nanticoke dam, the boys find in it a source of amusement. The bass which ascend at this season in great numbers, stopped by the dam, offered fine sport. Indeed, hooks, half a dozen at a time without bait, are let down and suddenly drawn up often with two or three bass hooked by the side."

And on the same page, from the Susquehanna Democrat: "A short time since great quantities of bass were caught in a small eddy formed in the river directly below the abutment of the Nanticoke dam. The fish apparently lay there in schools, and by drawing hooks through the eddy numbers were caught. On Thursday and Friday last a number of fine shad were caught in the same way. One man drew out nine in one day, and sold them for 50 cents each. This is the first instance within our knowledge of shad being caught with a hook. We mention the fact as one altogether new, as well as to say to the down-river folks, our market has not been altogether destitute of shad, though many a gentleman's table has."

We are informed that to-day the shad manage to get over the Columbia dam, only to be received in nets spread for them at the head of the sluice-way by a pack of scoundrels, among whom, if we hear correctly, are parties connected with our State fish commission; if it were not for this we would have shad in small quantities as far up as the next dam at all events. The cutting off of this staple of food from tens of thousands of people in this section of country could not but be a great loss, and it has been questioned if it was not greater than the benefits derived from the great internal improvements. Some slight improvements in the sluice-way of the lower dams and a regular ladder-way in that of the Nanticoke dam; good protective laws, well enforced (with a double-barreled shot gun for Columbia dam); certain days set for fishing along the river, and one good stocking with young shad would, we believe, give us shad in fair quantities all the way up the river.

We do not believe the expense would be very great, whereas the benefits would be incalculable. There is no doubt that the experiment is well worth trying.

Luzerne County will contribute her share towards the necessary improvements.

All of which is respectfully submitted.

HARRISON WRIGHT, Chairman of Committee.

WILKES BARRE, May 27, 1881.

LETTERS.

NORTHUMBERLAND, PA., May 25, 1881.

DEAR SIR: Your communication of 24th instant, touching fisheries in the North Branch of the Susquehanna, at hand and contents noted. In reply, I take pleasure in saying that my recollection of the shad fisheries dates back to the year 1820; in that year, and the succeeding two or three seasons, I fished at Rockafeller's fishery near Danville: in our party there were six of us; we fished with a seine 150 yards long, and caught somewhere from 3,000 to 4,000 marketable shad, weighing from 3 to 9 pounds. At that time there were eight fisheries between Danville and Line's Island, located as follows: Rockafeller's, just below Danville; next Carr's Island; next Grant's fishery; next Scott's, near where my residence was; next Line's Island upper fishery; next Smith's fishery; next Line's Island middle and lower fisheries. points large quantities of shad were caught, and they were sold from 124 cents to 25 cents apiece. I have heard of hauls containing from 3,000 to 5,000, and 300 was a very common haul. People came from 12 to 15 miles for shad, and paid cash exclusively for them.

Salmon, rockfish, pike, eels, suckers, and a general variety of fish were caught in addition to shad, and we always had a ready market for them for cash. No shad have been taken since the canal was built, and all other fish have sensibly decreased since that time.

The cutting off of the shad supply was a great and serious loss to this community, from both a monetary and economic view, since this fish in its season was a staple article of food, and employed in the taking and handling quite a large proportion of the inhabitants. This industry was wholly abolished by the erection of these dams, and thousands of dollars of capital invested in the business were instantly swept out of existence. The first fishery below this place was known as Hummel's fishery, and its reputation was good. I never fished there myself, but was well acquainted with it by the speech of my neighbors. In fact all of these fisheries were profitable investments, and the loss of them to this section of the country was incalculable. All of the fisheries mentioned above, except Hummel's, were between Northumberland and Danville. I am sorry that you did not give me more time to prepare this matter for you, since any mention of those good old times brings up a flood of recollections, and the difficulty is, not to remember what occurred in those days, but to sift out what would be useful in this connection, and omit all useless lumber; more time would have brought out a fuller and more detailed statement, but this perhaps is all that is essential, and trusting you will find it of use,

I have the honor to be, very respectfully, yours, &c.,

JOSEPH VAN KIRK.

FALLS, PA., March 24, 1881.

In response to your inquiries regarding shad fisheries in the Susquehanna, between Tunkhannock and Lackawanna Creeks, are, according to my recollections: The first at the head of Scovel's Island, opposite Lackawanna Creek; not many shad were caught here, say from twenty to sixty per night; the next was at Falling Spring, same seine as that used at Scovel's Island; the number of shad caught here ran from fifty to three hundred per night; the next above Falling Spring was at Keeler's Ferry (now Smith's); this was a small fishery and only used when the water was too high to fish at other points; the seine was hauled around a deep hole to bring in the shad; the next and only fishery between this and Tunkhannock Creek was at the head of Taylor's Island or the "Three Brothers." This was an important fishery; more shad were caught here than could be taken care of, on account of the scarcity of salt. I can speak of this fishery from experience since 1812. The eatch per night ran from two to four hundred; the shareholders attended to it as closely as to their farming or other business, as it was our dependence in part for food. Shad were oftener exchanged for maple sugar than sold for cash—one good shad for a pound of sugar; large shad were worth 121 cents apiece. A right in a fishery was worth from ten to twenty-five dollars. Shareholders made a practice of salting down more or less shad during the season. An incident in connection with shad-fishing presents itself to my mind, related often by my grandmother. A party

of Indians returning from a treaty at Philadelphia landed their canoes, came to her house to borrow her big kettle to cook their dinner in; after building the fire and hanging over the kettle they put in the shad, just as they were taken from the river, with beans, cabbage, potatoes, and onions. My grandfather, David Morehouse, one of the early Connecticut settlers, then owned the same farm I now own and occupy. I am now in my eighty-seventh year.

Yours, very respectfully.

HENRY ROBERTS.

MOUNT VERNON, OHIO, March 19, 1881.

DEAR SIR: I noticed in the Union-Leader an article in reference to the old shad fisheries of the Susquehanna River, and it brought back to my memory many things that happened in my boyhood days, among which were the old fishermen and the knitting of the shad seines. which were the old fishermen and the knitting of the shad seines. The seines were knit in sections by the shareholders, each one owning so many yards of the net, and each one receiving his share of fish according to the number of yards owned. I lived one year with Mr. Pierce Butler, where I learned to knit seines, and have never forgotten it. We used to knit on rainy and cold days and evenings, and when the sections were all done, Dick Covert, with the help of John Scott, would knit them together and hang the same, put on the corks and leads; this was considered quite a trick, and but few would undertake the job.

I remember I used to go over on the beach on the line of the Butler and Dorrance farms and help the fishermen pick up the shad, and when the luck was good always given one to take home. I remember seeing the shad put in piles on the beach, and after they were all equally divided some one would turn his back and the brailman would say, "Who shall have this?" until they all received their share, one pile left out for the poor women. The boats with the seine shipped would row up to the falls, and then hauled out down by the riffles opposite where Dick Covert used to live. I think it was a bad day for the people along the Susquehanna when the shad were prevented from coming up the river; the fish would be worth more to the people than the old canal. You had better buy the canal, put a railroad on the towing path, burst up the dams, and increase the value of all the flats above the dams, and you would not have as high water at Wilkes Barre, and there would be less damage done to property; then you would have plenty of shad and all other kinds of fish, and then I think you could afford to send some to your friends out West. I got an old fish-dealer here to send to Baltimore for some shad last week, but they had been too long out of water and too far from home to be good. It used always to be said that there were no shad like the old Susquehanna shad.

Truly your friend.

KANSAS CITY, March 22, 1881.

DEAR SIR: Your letter of the 15th was duly received, inquiring as to my knowledge of shad fishing in the North Branch of the Susquehanna River. I have no remembrance of any being taken at or near Sheshequin, but at Wilkes Barre I have seen them caught in seines before any bridge was built there. The nets were drawn out on the north side of the river. I don't remember to what extent was the catch, but I have often heard my mother say that immense quantities were taken in the vicinity of her father's, who lived about a mile below the old "Red Tavern," in Hanover; that at one haul 9,999 were caught; that when they had got all they could procure salt to cure, or sell for three coppers, they gave to the widows and the poor and hung up their nets, though the shad were as plenty as ever. In 1816 I went to Owego to live, and there became acquainted with a Mr. Duane, who was one of the men who drew the net. He said the actual number was 9,997, but two more were added to make the figures all nines.

When the Nanticoke dam was built the shad could not come above it, and men were in the habit of fishing there with a three-pronged hook, sinker, and stout line and pole. This was sunk, and after a few minutes quickly jerked up. I caught two in that way; others had better luck, and it was reported that one man caught seventy in one day; but I think a large reduction would come nearer the truth.

Probably E. Blackman, of Pittston, could give some information regarding shad fishing at Towanda and Sheshequin. Jesse Brown, long a resident of Sheshequin, and in his youth a resident of Wyalusing, I think; also Chester Park, of Athens, I presume, could give information upon the subject. The Park family kept the ferry at Athens at an early day. Both of the above-named, I think, are over eighty years of age.

I have been examining some old Gleaners of 1811 and 1812, but don't find any of the spring numbers. Some years ago I gave to my son-in-law, L. B. Wyant, of Harvard, McHenry County, Illinois, a roll of Gleaners of 1811 for his museum, which he opens at "Kay's Park," on Geneva Lake, Wisconsin, in summer. As it is getting to be a great watering-place, I expect to spend the summer there, and will examine the papers and may find some item in relation to shad fishing. If so, will write you.

Yours respectfully,

ALVAN DANA.

SCOTTSVILLE, March 10, 1881.

DEAR SIR: Yours in regard to shad fishing, I referred to father, and I received the following answers: 1st. There were two permanent fisheries, one at Sterling's Island and one below Wyalusing Falls, besides other places where they sometimes fished, viz., Grist's Bar, Chapin's Island; Whitcomb Island was also fishing ground, but not permanent-

2d. Sterling's Island was the best ground. 3d. Over 2,000 were caught in one day at five hauls. 4th. The market price was \$6 per hundred. 5th. The average weight was 8 pounds, the largest 12 pounds. 6th. They also caught suckers, yellow bass, and sunsbitches (what we call carp). 7th. None were caught after the canal and bridges were constructed to my knowledge. 8th. The first fishing was done by the Connecticut people. Father says that in 1806 his father had a share in the Sterling fishery; there were eleven shares, valued at \$100 each. Says his father was not much of a fisherman. Hoping these answers may be of some benefit.

I remain, very truly yours,

ALVAH FASSETT.

HOT SPRINGS, ARK., March 24, 1881.

MY DEAR SIR: Have not been well since the receipt of your letter, which must be my apology for not answering sooner.

In attempting to answer the questions propounded by the United States Commissioner of Fisheries, I must from necessity confine myself to the shad fisheries within Wyoming Valley.

1st. "Fix the number of fisheries and their location as far as is now practicable."

My memory carries me back to the fishery at Monocacy Island, the one below the falls, near the mouth of Mill Creek. One at Plymouth (in part a night fishery) one at or immediately below Nanticoke Falls. No dam obstructed the shad at that point then.

The fishery near Mill Creek was regarded as the main or most reliable fishery, as it could be fished at stages of water when some of the others could not, and much the largest number of shad were taken there, sweeping as did from the foot of the falls, nearly the entire river to the bardrawing out upon the lands of late father, where it was my busines as a lad every evening after school, to be with horse and wagon to receive our share of shad. No unpleasant duty, for well do I remember as they came sweeping in to the beak, the net in rainbow form. corks indicating the position where "Captain" Bennett (father of the late John Bennett, esq., whom you will remember) would discharge his men from the sea or large boat with the outer brail, and passing out and along the net, on the discovery would shout, "Here's shad, boys; hold down the lead line; here's shad." True to the word, long before the main body of the net was drawn up to the shore we youngsters would take up the "Captain's" cry, as the large shad darted back and forth between the incoming net and the shore. What think you, my dear Sec., would not a return of such scenes start a shout from older heads?

2d. "As to the money values or rental of the fisheries."

Of this I have no data from which to form an opinion. As the fisheries were established by the first settlers, joining their limited means with the land owners, forming a company there by common consent to their children, none were rented as far as my knowledge extends. Owners of rights would allow men who had none to fish for them on shares, thus extending the benefits as far as possible. Good feeling pervaded the community in those days.

3d. "Were other fish taken in any considerable quantity; if so, what kinds?"

With the exception of an occasional striped bass, or, as they were then called, "Oswego bass," of large size (supposed to have been introduced to the headwaters of the Susquehanna from that lake), none of value were taken, as the nets were woven for large shad only.

I cannot better illustrate the value and importance of the shad fisheries at that early day to the people on the Susquehanna River than to repeat an anecdote told me long years after by a genial gentleman of New England, who in youth visited my father at his home in Wyoming.

Leaning on the front gate, after breakfast, as the little children were passing to school, each with a little basket, the universal answer from their cheery, upturned little faces was, "Bread and shad," "Bread and shad" (corn bread, at that).

What think you, my dear sir? Had that fish diet anything to do with the known enterprise of that generation? If so, would it not be well to make a strong and united effort to again introduce so valuable an element of brain material?

I am greatly pleased that our society is agitating the subject of restoring the shad to the people on the North Branch, not as a luxury for the few, but for all, cheap and faithful, and coming at a season of the year when most desirable as food, for nowhere on this continent were finer shad found than those taken from the North Branch of the Susquehanna River.

The long run of the pure, cold, spring-made waters of the Susquehanna made them large, hard, and fat, nowhere equaled.

Why must we be denied this luxury now, when other streams are being filled with fish?

Very truly yours,

C. DORRANCE.

[From the Tunkhannock Republican, April 15, 1881.]

SHAD—HOW THEY WERE CAUGHT IN YE OLDEN DAYS—THE FISHERY COMPANIES—THE REASON SHAD DO NOT NOW INHABIT THE UPPER WATERS OF THE SUSQUEHANNA.

We are indebted to Hon. P. M. Osterhout for the following interesting history of early shad fishing in the Susquehanna. It was written by him for the Historical Society of Luzerne County, by the society's request:

The first shad caught in the Susquehanna River was by the early settlers of the Wyoming Valley, who emigrated thither from Connecticut.

The food of the early emigrants was, in the main, the fish of the streams and the game on the mountains. The first seine in the valley was brought from Connecticut, and upon the first trial, in the spring of the year, the river was found to be full of shad. These emigrants had settlements along the Susquehanna from Wyoming to Tioga Point, now called Athens; and each neighborhood would establish a fishery for their own accommodation. It was generally done in this way: Say, ten men (and it took about that number to man a seine) would form themselves into a company for the purpose of a shad fishery. They raised the flax, their wives would spin and make the twine, and the men would knit the seine. The river being on an average forty rods wide the seine would be from sixty to eighty rods long. The shad congregated mostly on shoals or the point of some island, for spawning, and there the fisheries were generally established. Shad fishing was mostly done in the night, commencing soon after dark and continuing until daylight in the morning, when the shad caught would be made into as many piles as there were rights in the seine. One of their number would then turn as there were rights in the seine. One of their number would then turn his back and another would touch them off, saying, pointing to a pile, who shall have this and who shall have that, and so on until all were disposed of, when the happy fishermen would go to their homes well laden with the spoils of the night. Between the times of drawing the net, which would be generally about an hour, the time was spent in the recital of fish stories, hair-breadth escapes from the beasts of the forests, the wilv Indian, or the Yankee production, the ghosts and witches of New England.

As early as 1800 George Miller and John McCord moved from Coxestown—a small town on the Susquehanna, about five miles above Harrisburgh—up the river in a Durham boat, and, bringing with them a stock of goods, located at Tunkhannock, where they opened a store. They were both young men and unmarried. In the spring of the year they dealt quite largely in shad, the different fisheries of the neighborhood furnishing them with large quantities for curing and barreling. Shad were plenty but salt scarce. There was no salt except what was wag-oned from the cities or from the salt works at Onondaga, N. Y., and it was not unusual that a bushel of salt would purchase one hundred shadin fact it was difficult to procure salt to ture them. At this time the German population in the lower counties of the State had not learned the art of taking shad by means of the seine.

There were then no dams or other obstructions to the ascent of the fish up the river, and large quantities of the finest shad in the world annually ascended the Susquehanna, many of them when taken weighing from six to eight pounds each. The distance being so long (about 200 miles) from tide water to the Wyoming Valley the flavor of the shad was very much improved by contact with fresh water. The Susquehanna shad were superior to the Delaware, the Potomac, the Connecticut, or the North River shad. The reason generally given was their being so long in fresh water, which imparted to the fish a freshness and richness not found in the shad of other rivers. Then none but the strong healthy shad could stem the current and reach the upper waters of our beautiful river.

Miller and McCord cured and put up annually shad for the market. They boated down the river a large quantity for the times, and sold to the people on the lower Susquehanna. They also boated shad up the river as far as Newtown, now Elmira, from thence they were carted to the head of Seneca Lake, a distance of twenty miles, and from there were taken to Geneva and other towns, in what was then called the Lake country, and sold.

There was a fishery on the upper point of the island opposite McKune's Station, on the Lehigh Valley Railroad. This island was known by the early settlers as one of the Three Brothers. There was also an important fishery at Hunt's Ferry, about five miles above Tunkhannock. Here large quantities of shad were caught every spring. This fishery was owned by twenty rights, ten fishing at alternate nights. There was also another fishery at Black Walnut, below Skinner's Eddy. these fisheries more or less Oswego bass were caught, called down the river Susquehanna salmon, a most excellent fish, but they are now The river ought to be restocked with that same species: nearly extinct. they are a fine-flavored fish, solid in meat, and grow to 12 or 15 pounds in weight. The late George M. Hollenback, esq., of Wilkes Barre, told me that this bass was brought from the Oswego Lake and put into the Susquehanna at Newton, now Elmira. They were called by the old settlers swager bass. Since the building of the dams across the Susquehanna there have been no shad caught above the Nanticoke dam. These dams also largely obstruct the passage of bass and other food fish up river. The Susquehanna is really one of the finest streams for fish in the United States—the water pure, the bottom rocky and pebbly, affording abundant means for spawning and rearing the young fish. The obstruction to the free passage of fish up the river ought to be removed.

Maj. John Fassett, of Windham Township, one of the oldest citizens of that town, as was his father before him, was written to on the subject of the early shad fisheries from Hunt's Ferry to Wyalusing. He mentions the one at Hunt's Ferry; also, at Black Walnut, and others at different points up the river as far as Wyalusing. He says his father owned a right in the fishery at Black Walnut, which he valued at \$100; here were large numbers of shad caught, which were valued at 6 cents each, and would weigh from 6 to 12 pounds each. The largest one he saw weighed was 12 pounds; the writer hereof thought he had got it pretty steep as to weight, but he was beaten by Jennison Harvey, esq., an old resident of Plymouth, Luzerne County, now of Wilkes Barre, who says that he saw a shad weighed—on a bet—that was caught in the river in the valley and that it weighed 13 pounds. Some folks will think it a fish story. Harvey has decidedly the advantage of Major Fassett, as he had the last say.

[From the Berwick Independent, March 10, 1881.]

SHAD FISHING IN THE SUSQUEHANNA-WHAT MR. GILBERT FOWLER KNOWS ABOUT IT.

The Wyoming Historical and Geological Society having requested Mr. Gilbert Fowler, of this place, to give any information he may possess concerning the shad fisheries of the Susquehanna, the following has been furnished by him:

BERWICK, PA., February 23, 1881.

MY DEAR SIR: Your letter, requesting me to give your society my recollections of the shad fisheries in my early days, was duly received. I will do so with great pleasure. But first let me premise: I was born February 23, 1792, in Briar Creek Township, Northumberland County, now Columbia. I write or dictate this letter on my eighty-ninth birthday. I have lived near the Susquehanna River ever since I was born. My knowledge and recollections about the shad fisheries extend from Wilkes Barre to old Northumberland. The first shad fishery near my home was Jacob's Plains. This was located just above the town of Berwick, and one of the most productive fisheries on the river. Here I have assisted in catching thousands upon thousands of the very finest shad weighing eight and nine pounds. The next nearest was Tuckaho fishery, situated about one and a half miles above Berwick, on the same side of the river. At this place many thousands were caught night and day in early spring. The next was down the river about six miles from Berwick. This was the fishery of Benjamin Boon. At this fishery I have known so many caught that they were actually hauled out by the wagon load on Benny Boon's farm for manure, so plenty were they. The next fishery was that of Samuel Webb, located about four miles this side of Bloomsburg. This was an immense shad fishery. From the banks of the river at this fishery could be seen great schools of shad coming up the river when they were a quarter of a mile distant. They came in such immense numbers and so compact as to cause or produce a wave or rising of the water in the middle of the river extending from shore to shore. These schools, containing millions, commenced coming up the river about the 1st of April and continued during the months of There was something very peculiar and singular in April and May. their coming. The first run or the first great schools that made their appearance in the early spring were the male shad—no female ever accompanied them. In about eight or nine days after the male had ascended the river, then followed the female in schools, heavily laden with eggs or roe. Those were much the largest and finest fish, and commanded the highest price. Those shad that were successful in eluding the seine and reached the hatching ground at the headwaters of the Susquehanna, after depositing their eggs, returned again in June and July, almost in a dying condition, so very poor were they. Many died and were found along the river shore. The young shad would remain

at their hatching places till late in the fall when they would follow the old shad to the salt water. During the summer they would grow from three to four inches in length. The Susquehanna shad constituted the principal food for all the inhabitants. No farmer, or man with a family, was without his barrel or barrels of shad the whole year round. Besides furnishing food for the immediate inhabitants, people from Mahantongo, Blue Mountains, and, in fact, for fifty miles around, would bring salt in tight barrels and trade it for shad. They would clean and salt the shad on the river shore, put them in barrels, and return home. price of shad was three and four cents each. Besides shad there were many other kinds of food fish. The most noted among them was the old Susquehanna salmon, weighing as high as fifteen pounds. These salmon were considered even superior to the shad and commanded a higher price. They were caught in seines, on hooks and lines, and were the sport to the gigger at night. Nescopeck Falls, directly opposite Berwick. near where the Nescopeck Creek empties into the river, was a noted place for salmon fishing with hook and line. Men standing on the shore with long poles and lines would often, in drawing out the fish, lodge them in the branches of the trees, giving them the appearance of salmon-producing trees. The shad fisheries, which I have alluded to, were not common property. The owner of the soil was the owner of the fishery, and no one was allowed to fish without a permit. The owners of the fishery also had the seines, and when not using them they would hire them out to others and take their pay in shad. The seiner's share was always one-half the catch. Shad were caught both night and day in seines. At the Webb fishery I have known eleven and twelve thousand shad taken at one haul. These fisheries were always considered and used as a source of great pleasure, value, and profit, and everybody depended on them for their annual fish and table supply. It was considered the cheapest and best food by all. Immediately after the erection of the river dams the shad became scarce, the seines rotted, the people murmured, their avocation was gone, and many old fishermen cursed Nathan Beach for holding the plow, and the driver of the six yokes of oxen, that broke the ground at Berwick for the Pennsylvania Canal. suffered more damage in their common food supply than the State profited by her "internal improvement," as it was called. Although eightynine years old to-day, I still hope to live long enough to see all the obstructions removed from one end of the noble Susquehanna River to the other, and that the old stream may yet furnish cheap food to two millions of people along its banks, and that I may stand again on the shore at the old Webb fishery and witness another haul of ten thousand shad. All of which is most respectfully submitted for the consideration of the honored society which you have the honor to represent.

GILBERT FOWLER.

HARRISON WRIGHT, Esq.,

Secretary of the Wyoming Historical and Geological Society, Wilkes Barre, Pa.

WYALUSING, March 14, 1881.

SIR: Your communication of the 26th ultimo was duly received, and in reply to your request for information relative to the shad fisheries of this vicinity, I am able to state the following facts, answering your questions in detail:

Commencing at Standing Stone, about 10 miles from Wyalusing village, and reaching down the road from that point to the Wyoming County line, there were five "old shad fisheries," viz:

- (1) The "Standing Stone fisheries." William Hank, Benjamin Brown, Cornelius Ennis, and Benjamin Bennet owned this. It was a valuable property, worth at that time from three to four hundred dollars a year. There were from three to four thousand shad caught there annually. They caught no rock or striped bass, sturgeon, or herring there or at other fisheries in this vicinity.
- (2) The Terrytown fishery. This was owned by Jonathan Terry, William Dodge, Edmund Dodge, Samuel Wells, and John Taylor, and was of about the same value as that at Standing Stone.
- (3) The Wyalusing fishery, owned by John Hollenback, Benjamin Stalford, Joseph Stalford, and John Stalford. This fishery was worth about \$250 a year, with a "catch" of from two to three thousand shad.
- (4) The next was the "land" fishery at the head of Ingham's Island. Joseph Ingham owned this, and it was worth about \$200 a year.
- (5) Next was the Brown Town fishery, owned by Humphrey Brown, Allen Brown, and Samuel Brown, and was worth about \$150 per annum.
- (6) The next and last was called the "Bend fishery," and was located near the line between Bradford and Wyoming Counties. James Quick and James Anderson owned this, and it was worth about \$150 a year.

The stoppage to the emigration of shad to this vicinity was a great loss to the people. For nearly two months every year the people for from 15 to 20 miles, from the poor, were bountifully supplied, and I should consider it a great benefit if the fisheries could be restored.

Respectfully,

NELSON B. HOLLENBACK.

MARCH 3, 1881.

DEAR SIR: Yours of the 26th ultimo, making enquiry in relation to shad fisheries near Wyalusing, is at hand. I spent many a pleasant day in my boyhood with the men who ran the shad fishery in the Susquehanna, near where I now live. I could easily fill a small volume with a description of the varied amusements and merriments of these by-gone days, but that would hardly be what you are after. This fishery was about two miles above the mouth of the Wyalusing Creek, at the place we now call Terrytown; formerly all was Wyalusing along There were other fisheries above and below us, but this the only one I have any personal knowledge of. The proprietors were Jonathan

Bull. U. S. F. C., 81-24

July 7, 1882.

Terry, esq., Maj. John Horton, sr., Maj. John Taylor, Edmund Dodge, Maj. Justus Gaylord, Gilbert Merritt, William Crawford, and William Wigton. Year after year, for a long time, these men operated this fishery, generally taking the month of May and a part of June of each year, always regaling themselves with a little good old rye, and having a fine sociable every night, when counting off and distributing the shad caught during the day. Occasionally they sent substitutes, but the fishery never changed proprietors. Some seasons they caught largely; others not so many. I well recollect one draught, or haul, when they caught 500, but ordinarily 20 to 50 at one drawing of the seine was considered good. The average per day, according to the best of my recollection, would be about 150.

People came from the eastern part of the county, then just settling, up to Wyalusing, as far or nearly as far as from Montrose, to buy shad. The trade was quite large. Some of the time maple sugar was quite a commodity, brought down to exchange for shad.

Very few of any other kind of fish except shad were ever caught Occasionally a striped bass, large pickerel, carp, sunfish, mullet, sucker, or a bull-head was taken; no small fish, as the meshes of the seine were large enough to let them through.

The shad were worth from 10 to 25 cents each, according to size. I have seen them caught here weighing nine pounds; ordinarily their weight was from four to seven pounds. If we could have that old shad trade here again it would make us all, if not rich, merry again. But very few are now left among us who saw those glorious old fishing days. The fishing for black bass of these days does not begin with those old fishing days.

I cannot recollect of but one fishery between Wyalusing and Towanda, and only two between Wyalusing and Tunkhannock.

Hastily, but very truly, yours,

GEORGE F. HORTON.

FISH IN THE SUSQUEHANNA AT WYOMING.

In accordance with your request I will give you a few items in regard to fish in the Susquehanna, in the early times.

The present inhabitants of Wyoming have but a faint idea of the value of fish to the early settlers. They performed as important a part at Wyoming as they have in the history of all new settlements. A careful study of the advance of immigration and the settlement of new regions shows that those settlements have been guided and controlled by the streams and waters in which fish abounded, and hence were made along their shores. Fish furnished the people a plentiful and healthful supply of food, easily attainable, until the forests could be hewn down, clearings made, crops raised, and cattle could increase and multiply.

It is unquestionable that the early progress made in settling up of

our country was due in a large measure to the presence of fish, which furnished food in absolute abundance in the midst of desert lands; and it would be as idle to attempt to disparage the value in the economy of those times as it would be to prove the value now beyond the mere mention of the fact.

The fish that attracted the most attention and were the most highly considered in the early times were shad. The knowledge of these excellent fish in the Susquehanna, at Wyoming, has become almost entirely historical, if not entirely so. But few persons, now resident at Wyoming, have a personal knowledge of the shad fisheries there and their value to the people in the early days, and hence some of the stories told of the immense hauls of them made in "ye olden time" seem to the present generation more fabulous than real.

That we may the better understand the subject, I will give extracts from the writings of strangers, and then conclude with an account or two of our own people and what I myself have seen.

In 1779, when General Sullivan passed through Wyoming on his western expedition against the Indians, portion of his advance were located at Wyoming from May to the last of July. Many of his officers kept diaries, in which they noted their movements from day to day and touched slightly upon such objects of interest as attracted their attention. I will give a few extracts from these diaries relating to fish at Wyoming.

Dr. Crawford in his diary, under date of June 14, 1779, says:

"The river at Wyoming abounds with various kinds of fish. spring it is full of the finest shad. Trout and pickerel are also plenty here."

George Grant, under date of June 23, says:

"The Susquehanna River affords abundance of fish of various kinds and excellent."

Dr. George Elmer, under date of 23d June, says:

"Spent chief part of the day in fishing. Salmon, trout, suckers, bass, and common trout are plenty in the river, of which we catched a number with a seine."

Daniel Gookin, under date of 28th June, says:

"The river Susquehanna, on which this lies, abounds with fish. Shad in great plenty in the spring, as they go up to spawn. The shores are covered with these fish which have died up the river, through their too long stay in fresh water."

There were some 25 or 30 what we called shad fisheries within the bounds of old Wyoming. Every available point for casting out and hauling in a seine on the beach, whether on an island or on the mainland, was used as a fishery, and had its owners and its seine. The average number of shad taken at each of these fisheries in a season was from 10,000 to 20,000, beside other fish which were caught before and after the shad made their migration.

It is given on good authority that 10,000 were caught at one haul at the Stewart fishery, about midway between Wilkes Barre and Plymouth, about 1790. This was called the widows' haul.

The settlements, after the massacre of July 30, 1778, had so many widows and fatherless children among them, that they made special provisions of bounty for them on many occasions, which were wrought out in such a way as neither to give offense nor to convey a sense of undue obligation.

Among the arrangements of this character was that of giving one of the hauls at each fishery, every year, to the widows and fatherless of the neighborhood, and hence called the widows' haul. By common consent it was agreed that the widows should have a haul made of the first. Sunday after the season of shad-fishing commenced, and they were to have all caught, whether more or less.

This big haul was made on Sunday.

At the rate I have given, which is made up more from general information upon the subject than from statistics, the number of fish caught annually was about a half a million, which at 30 cents each would make \$150,000.

Were the Susquehanna as well stocked with shad to-day as it was a hundred years ago, our keen and hungry fishermen would easily double the catch, and still, like Oliver Twist, "cry for more."

I recollect seeing, in the spring of 1826, a haul made in a cove at the lower end of Wintermoot Island, west side, numbering 2,800 shad. When thrown out they whitened a large space upon the shore.

Being the first haul of the season, the fish were largely distributed among the people, and even after that, my grandfather had a half barrel for his right as owner of the seine and fishery.

About 1831 or '32, in the fall, an unusual catch of eels was made in a weir on the east side of Wintermoot Island. During one day and night 2,700 of them were caught, while many escaped from want of means to handle them and take them away as fast as they came in. Another day and night 900 of them were caught, when the basket floated off with the high water.

I herewith give you copies of two papers in my possession bearing upon the shad-fishery question. It will be seen by one of them that the price of shad in the early times was 4d. or $4\frac{1}{3}$ cents each; quite a different price from what they sell at in our day.

Tear the dam from the Susquehanna and we shall have plenty of shad, if not at 4d, each.

Yours,

S. JENKINS.

"Be it known that I, Peter Shafer, have sold all my right in and unto all my right in the Dutch fishery, so called, below the Nanticoke Falls, so called; for and in consideration thereof I, Jacob Cooley, do promise to deliver Seventy shad, unto William Miller, on account of me, the said Peter, on or before the 20th May instant; or otherwise settle with said Miller for what I am indebted for my part of said Seine, and likewise the said Cooley is to deliver Six gallons of Whiskey unto the said Peter, between this date and Weat harvest.

"Witness our hands this 14th day of May, 1800.

"PETER SHAFER.
"JACOB COOLEY."

"James Fox holds an order for 725 shad drawn by George Frazer on James Stewart, date April 27.

(Indorsed on the back in these words:) Credit for 350 shad received by me. David Morgan.

(Endorsed:) Copy of Frazey's order. Henry Thomas charges the Estate with 4s. 8d., paid in Rye. Paid.

No. 40-

725
Rec'd 350

375 shad at 4d.

125 s.

£6 5s. \$16 67
Interest on same, 9 50

26 17 $(\pounds = \$2.67)$

PITTSTON, March 22, 1881.

DEAR SIR: Yours of the 15th instant came to hand. I feel interested in your Historical Society, having years ago, with the late Dr. Josiah Blackman, been an invited guest to an anniversary dinner of your society, and have written some reminiscences for the newspapers; but I fear, never having been a fisherman, I cannot afford you much valuable information.

I inclose you a card with Esquire Thomson's address. Though a few years my junior, yet I know that, in those days I shall speak of, he was quite a fisherman. I understand from his son-in-law, H. C. Dewey, that his memory and intellect are good.

I see by your correspondent's—G. Fowler, of Berwick—published letter that he tells a big fish story. I incline to think, however, that it is true. I recollect when I lived with my grandfather, in what is now South Wilkes Barre, perhaps 1798 or 1799 of last century, the great haul of shad at Nanticoke was made. I believe there were nine or ten thousand taken. A number of seines were engaged in it, and lawsuits were the consequence. Salt was scarce and dear. Northampton men came with pack-horses loaded with salt, and returned loaded with shad. I bought and kept the public house that had been kept by John Courtright on the Plains, Wilkes Barre Township, in the spring of 1815. There

were then two fisheries between us and the Pittston Ferry-one at Monocacy Island landing, on the shore of Mr. Samuel Cary's land, the other starting at or near the Wintermoot Island and landing above the ferry at Blanchard's. That season I got my supply at the upper fishery; the first day's attendance was a "blank" day-few or no fish. The large schools of Mr. Fowler's times were dwindled greatly, caused undoubtedly by the numerous fisheries that existed below, and the destruction of the young shad by the many eelweirs, in their descent to the ocean in the fall. My time was too valuable to attend on blank days. I left money with Mr. Joseph Armstrong, and he sent me my supply when successful. The next season (1816) the difficulty that had existed between the fishermen at Monocacy (twelve in number) and Mr. Cary, the owner of the land, by giving him the thirteenth share settled the difficulty, and ever after I got my supply from the fishery until the canal dams cut off our supply totally. It was a serious damage and inconvenience to us, as markets for fish and meat did not exist then as now. The Susquehanna shad had a far more delicious flavor than any we get now.

General Isaac Bowman, Samuel Moffit, and some of our Plains neighbors, having secured a landing on the Nommock at the foot of Monocacy Island, fitted up a fine seine and necessary boats (canoes) and caught half a dozen shad, having fished twice as many days. I shared two, having found the whisky (before my temperance days); others outbid me, determined to taste the good of their labors. I fatigue much in writing, being in my ninetieth year.

Respectfully yours,

ELISHA BLACKMAN.

LEE, LEE COUNTY, ILLINOIS, 4-12, 1881.

DEAR SIR: I was born at Pittston in 1796. My father's farm lay along the side of the Susquehanna River. I lived on the farm fifty-one years. In regard to the shad fishing, as I grew up to manhood I fished many days in the shad-fishing season of the different years. The first run was the male shad-not near as good as the female. After catching the first run then, if we could have a rise of water then came the female -a far better quality. The female put for the headwaters of the river, and there would spawn; then the old fish would come back down the river, and the wind would often drive them on the shore, and they would lay there rotting till they stunk. People used to come down from toward Easton, Northampton County, and bring whisky and salt, and trade for fish; also from the upper part of old Luzerne County, bringing maple sugar to trade for shad. One man by the name of Taylor bought fifteen and put them in a sack after they were cleaned, shouldered them and walked off with them. I have known upwards of a thousand caught in one day on the point of the island. As to the localities of the fisheries, there was one at Falling Spring, about four miles from where I

lived, another on the point of Wintermoot Island, and the next on the side of the island between two and three miles from where I lived. They drew out on the beach of Samuel Cary's farm; another just below that, I think, drew out on the farm of Crandall Wilcox; another just below the falls. Please excuse me now, as I have done as well as my memory will allow me to. We have done no fishing since Nanticoke dam was built.

With regards,

ISAAC THOMPSON.

INTERVIEWS, &c.

Steuben Butler, a son of Col. Zebulon Butler, who led the patriots at the battle and massacre of Wyoming, 1778, says:

I was born 1789; remember the old shad fisheries in the river here very well; was not a fisherman myself; after the run of shad had started I used to get in a boat and row up to the fishery and purchase my supply of shad and bring them down and salt them away. The price varied according to the abundance of the shad, some seasons being less expensive than others. As I recollect it, the Pettibones used to have charge of the fishery above Wilkes Barre.

Dr. Charles F. Ingham says:

I remember the old shad fisheries in the North Branch, particularly the Butler fishery, which was on the bar opposite and a little above Union street, Wilkes Barre. Nanticoke dam was commenced in 1828 and finished in 1830, and I recollect that that ended our fishing. Although I saw shad caught below the dam by hooks attached to poles—think it was the year the Shamokin dam went out-yet I have never heard tell of or seen shad being caught since that time above the dam. The shad, as I remember them, were very fine and particularly large. I have seen the beach, after the drawing of the seine, for a hundred feet absolutely alive with flapping shad, each one reflecting the sunlight like a burnished mirror. I recollect having the salted and smoked shad during the fall and winter, and fine delicacies they were.

After our shad fishing was cut off, a great number of salt shad were brought from Philadelphia and other points, meeting with ready sale, on account of general knowledge of their delicacy. I believe that at one time the people knew more of salt shad than they now know of salt mackerel, and more of smoked shad than now of smoked salmon.

I believe that a proper shad-way could now be put in the Nanticoke dam sluice-way or chute at an expense not to exceed \$10,000, and probably for less, without interfering with navigation.

Mr. Isaac S. Osterhout says:

In 1820 or 1821, we caught shad in very large quantities at Black Walnut Bottom. I remember well I went with Captain ——— to Salina, New York State, after salt, as we had run out of that article very early in the season; he had a load of whetstones and I a load of shad. I could have easily gotten rid of my shad on the first day had it not been that the Captain and I had agreed that the whetstones should sell the shad, and *vice versa*. So it was several days before we got our loads of salt, as the whetstones went terribly slow.

In 1822 and 1823 I was at Hunt's Ferry, where the shad were plenty. I came to Wilkes Barre in 1830, the early part of the year—the same year the Nanticoke dam was finished; do not recollect of any shad being caught after that. I recollect of a Mr. Water Greens, who came from New England and settled at Black Walnut Bottom, giving twenty barrels of shad for a good Durham cow.

Miss Mary Coates says:

I was born in 1803; came to Wyoming Valley to live in the year 1823. I remember very well the catching of shad in large numbers by the inhabitants and the cleaning of them along the river shore. I remember, too, that the country people came in crowds during the season from miles away and returned home laden with fish. I remember the anger of Gildersleeve's negress one day, when it was said that Gildersleeve had made her wade out into the river after shad heads. The circumstance was as follows: While cleaning the shad she had cut off the heads and placed them on a board, saving this most delicate part of the fish for herself, and while she was busy the board, covered with shad heads, was either pushed by some one, or drifted out into the river, when she waded out to get it. Do not know anything of the numbers caught. The people had shad from spring to spring. I do not remember of any shad being caught after the Nanticoke dam was put in.

Capt. James P. Dennis says:

I remember the old shad fisheries in the river. There was one just below the bridge at Wilkes Barre, drawn out on the opposite shore; this was called the Bowman fishery. I recollect once holding the shore brail of the seine at this point, when William Alexander held the river brail. There was a fishery on Fish's Island, about three-quarters of a mile below the bridge.

Jameson Harvey says:

I was born in 1796. I remember the old shad fishing in the North Branch of the Susquehanna River very well. James Stewart had a fishery opposite my place. The big haul was made at Fish Island fishery. I recollect it very well; they didn't know how many they caught. After all were disposed of that could be, the rest were thrown on the fields, and pretty near stunk us to death; they were landed on the point of the island. There were two seines on Fish Island, one owned by Nanticoke parties, the other by Buttonwood parties, who took turn about fishing. The Mud Fishery was at Steele's Ferry; they drew out on Shawnee side. The Dutch fishery was below the dam on Croup's place. Below Hunlock's Creek was another, that was called a mud

fishery. There was a fishery at Shickshinny. When the big haul was made the shad sold for a cent a piece; they sold as many as they could: there wasn't salt enough. In those days they didn't salt down so much pork: they depended upon the shad they caught; they gave the poor a chance after they got all they wanted. People on the West Branch used to own an interest in the Hunlock fishery, and a Mr. McPherson used to come in a boat to get their fish and take them back. They used to come from Easton bringing salt, with which they used to buy fish; von could get one hundred shad for a bushel of salt. Nanticoke dam was commenced in 1828 and finished in 1830. I only recollect of one shad being caught above the dam since it was put in, and that was on the flats after a big freshet. The people used to go off the bars with as many shad as they could carry; they came in from all around in crowds; they used to camp and salt their fish down on the banks of the river. Mr. McPherson used to take his boats back to the West Branch loaded. He traded off cider, oil, and whisky. At the time the dam was put in, shad were selling for 10 cents and 12 cents each. Widow Stewart used often to take in \$30 or \$40 of a night for her share of the haul.

Hunlock's, Dutch, and Mud fisheries were night fisheries. Stewart's and Fish Island were day and night fisheries. Farmers hauling grain to Easton often hauled back hundreds of bushels of salt.

Boats coming up the river used to bring leather, cider, oil, salt, and iron: going back they would take shad.

McPherson and Hunlock owned the Hunlock fishery and had a large fish-house. Hunlock got as his share from five to six hundred dollars per year, besides all the shad he could use. We used to have shad until shad came again.

The owners of fish-houses used to have arrangements so that when they run out of salt they could dry and smoke the shad, as they now do herring and salmon. Some of the shad used to weigh 8 or 9 pounds. I saw one weighed on a wager turning the scales at 13 pounds; about seventy or eighty would fill a barrel. The shad improved very much coming up the river, those caught in this valley being very much larger and finer than those caught at Columbia. I remember when Shamokin dam went out, the shad came up to our dam and were caught.

The following is an extract from Miner's History, p. 209:

April 21, 1778.—At a Town meeting prices were set on articles of sale, &c.: Tobacco, per lb 9d

[From the Susquehanna Democrat.]

1818. April 17.—"Newark, N. J., April 7th, shad fishing. On Wednesday 3 shad were caught in the river Passaick. A pair of them weighed eleven pounds, and were sold to one of our public innholders at a shilling a pound. A solitary one was caught about 2 weeks before & sold to the same innkeeper."

1819, May 14.—"Shad are this season taken in unusual numbers; they have been sold in Philadelphia as low as \$4.50 per hundred, & at the Potomac fisheries as low as \$3."

1820, April 21.—"At Alexandria shad is selling for \$2.50 a hundred and at Philadelphia they are selling for \$3. In Wilkes Barré, notwithstanding the scarcity of money, they are held at \$18.75."

1822, April 26.—"We congratulate our friends on the prospect of soon obtaining a supply of fresh shad; about sixty were caught here on Wednesday (24th), and yesterday (25th) upwards of three hundred. We learn that at Berwick they are caught in abundance."

The above was all I could find in a file of 14 years, 1810–1824, bearing upon shad. In the Federalist, printed at the same time, nothing was found.

H. W.

Know all men by these presents that I, Silas Smith, of the township of Newport, county of Luzerne, and State of Pennsylvania, have sold unto Caleb Wright, of the District of Huntington, in the county and State aforesaid, one equal half share of a fishery on the lower end of my farm, for the consideration of twenty pounds (\$53.33) lawful money of Pennsylvania to me in hand paid, the receipt of which I hereby own and acknowledge. I hereby bind myself, my heirs, executors, administrators, or assigns, and every of them, by these presents, to warrant and forever defend unto him, the said Caleb Wright, his heirs, executors, administrators, or assigns, the one-half of said fishery to the only proper use and benefit of him, the said Caleb Wright, his heirs, executors, administrators, or assigns.

In witness whereof I have hereunto put my hand and seal, this four-teenth day of May, in the year of our Lord one thousand eight hundred and four—1804.

[SEAL.]

SILAS SMITH.

Witness present:
BETSY MILLER,
MARGERY SMITH.

[From Miner's History of Wyoming, p. 141.]

"The month of February, 1773, had so nearly exhausted the provisions of the Wilkes Barre Settlement, that five persons were selected to go to the Delaware, near Stroudsburg, for supplies. * * * The distance was fifty miles, through the wilderness, &c. * * The men took each an hundred pounds of flour, and welcome was their return to their half-famished friends at Wilkes Barre. Never was an opening spring, or the coming of the shad, looked for with more anxiety, or hailed with

more cordial delight. The fishing season, of course, dissipated all fears, and the dim eye was soon exchanged for the glance of joy and the sparkle of pleasure, and the dry, sunken cheek of want assumed the plump appearance of health and plenty."

REMARKS ON THE SCARCITY OF MALE AND GRILSE SALMON IN THE BIVERS OF ONTARIO, CANADA.

BY SAMUEL WILMOT.

[Letter to Prof. S. F. Baird, U. S. Commissioner, Fish and Fisheries.]

DOMINION OF CANADA—PISCICULTURAL ESTABLISHMENT, FOR THE ARTIFICIAL PROPAGATION OF SALMON, WHITE-FISH, TROUT, BASS, ETC.

NEWCASTLE, October 30, 1880.

DEAR SIR: I desire to acknowledge with many thanks the receipt of some 50,000 California salmon eggs. They arrived here in first-class condition, and are now all hatched out. I also notice with much pleasure the arrival at New York, and shipment to Europe, of a very large lot of these ova, all of which were reported to be in very fine condition. This success in your efforts in connection with fish-culture, whilst it must be very gratifying to yourself, is likewise pleasing to me, and no doubt to all others engaged in the industry of artificial fish culture.

I have to record a most peculiar circumstance in relation to our Ontario salmon this autumn. I speak more particularly of those which have come into my stream here. The same falling off in numbers is felt here as has been the case in all the rivers and streams on the Atlantic My reports received from the several officers in charge show a wonderful falling off. At the Saguenay, where formerly our requisite supply of some 300 parent salmon were easily obtained in a few weeks in June and July, only some 75 could be captured during the whole season; on the Restigouche, the most famous salmon river we have, only some 600,000 salmon ova could be gathered, whereas in former years no difficulty was experienced in getting one and a half to two millions. At the Miramichi and Halifax nurseries the result is not known; no reports have as yet come in, but I fear a similar falling off will take place there as well. In connection with the reduced numbers of salmon at this hatchery, strange to say, only three males have yet been found in the stream; all that have been captured or have entered the reception house are immensely large females. We have enough of these on hand at present to give us 250,000 eggs, but we have not, nor can we find in the whole stream, a single male fish to impregnate these eggs with, should What we shall do puzzles me very much; add to this the fact that the season is about over for fish to enter the stream. day I went down the creek with one of my men and caught some 18 magnificent female fish on the beds in the open stream in broad day-