

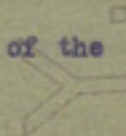
JOHN W. KING
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CIVIL & MECHANICAL ENGINEER
MIAMI, FLORIDA

Authentic Copy of
REPORT

of

EXAMINATION and EXPLORATION

of the



A.W. HOPKINS PROPERTY

MONROE AND DADE COUNTIES, FLA.

By

John W. King

Jan. 17, 1917. Miami, Florida.

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1.

Captain J.F. Jaudon.,
1018 Avenue B.
Miami, Florida.

Dear Sir:-

In accordance with your request for a report upon
the A.W. Hopkins tract located in Monroe and Dade Counties,
Florida, and consisting of

| Township | Range | Township | Range |
|----------|-------|----------|-------|
| 54 | 31 | 55 | 31 |
| 54 | 32 | 55 | 32 |
| 54 | 33 | 55 | 33 |
| 54 | 34 | 55 | 34 |

Also, Sections 1-2-3-4-5 & 6, Township 56, Range 31.

Sections 1-2-3-4-5 & 6 " 56, " 32

Sections 1-2-3-4-5 & 6 " 56 " 33

Sections 1-2-3-4-5 & 6 " 56 " 34

situated in Monroe County.

Also, Sections 6-7-18-19-30 & 31, Township 54, Range 35.

Sections 6-7-18-19-30 & 31, " 55, " 35

situated in Dade County.

I extended my trip to and from the Manetto Companys' prop-
erty and entered the Hopkins property from the Lossmans River
on the Southern boundary and again from the Gulf on the West;
both times making general as well as detailed observations and
examinations of this territory;- this report of observations
and examinations is given in conjunction with the report upon
the property of the Manetto Company.

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2.

After making a general observation, I made detailed examinations and explorations of this territory by ascending rivers, creeks and other water passages to the interior from which, advanced to some elevated point where a general view of the country could be obtained. The result of such examination, I beg to submit as follows:



X-1902-15
EXHIBIT 1. Photographic view of Lossmans River, across
3rd. Lake.

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3.



EXHIBIT 2. Photographic View of Locmans River, showing entrance into Dr. Tigers Lake.



EXHIBIT 3. Photographic View of across Dr. Tigers Lake, showing Dr. Tigers Plantation, now abandoned.

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4



EXHIBIT 4. Photographic view abandoned clearing on south shore of Chatham Bend River, having growth of "run out" sugar cane, growing from ratoon; Formerly, portion of "Watson" place.



EXHIBIT 5. Photographic view of place occupied by D.H. Whitton, on north west shore of Chatham Bend River, formerly old Watson place, showing house, sugar mill, with sugar cane growing in back ground. Area of

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5

cultivated plantation about thirty acres, originally
old shell mound.



EXHIBIT 6. Photographic View of the same Whitton Place, from
the North-west.



EXHIBIT 7. Photographic view of Chatham Bend River, showing
magnitude of same, taken at a point immediately
north east of Whitton Place.

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6.

X-1502-20



EXHIBIT 8. Photographic View of Chevelier Bay. Head of Chatham Bend River, showing magnitude of Bay.



EXHIBIT 9. Photographic view of Bird Roostery and nesting place (sometimes called Rookery) in Alligator Bay southwest of Chevelier Bay.

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7

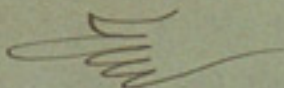


EXHIBIT 10. Blue print showing general location of the properties above mentioned and known as the A.W. Hopkins Tract.



Attached at End of Report.

EXHIBIT 11. Detail map of entire exploration and examinations of various properties showing routes pursued and relative approximate locations, character, conditions, gradients etc. of the properties.

General description of the property.

The property of the A. W. Hopkins Tract lies in a single rectangular block thirteen miles wide and twenty-five miles long. The North boundary of this property lies coincident with the Northern boundary of Monroe County and the Southern boundary parallels the Northern boundary, at a distance of 13 miles. The Eastern boundary extends one mile east of the Dade County line, and the Western boundary is coincident with the Eastern boundary of Range 31, for a distance of approximately 10 miles; thence in a Southeasterly course along the borders of the Gulf of Mexico, for a distance of approximately $4\frac{1}{2}$ miles, to the intersection with the Southern boundary, containing in all some 207,000 acres. At a distance of about $3\frac{1}{2}$ miles from the Northeastly corner of this property lies the Tamiami Trail, the new road from Miami to the West Coast of Florida, about 40 miles from the City of Miami.

At a distance of about $4\frac{1}{2}$ miles from the coast of the Gulf of Mexico, lie a series of INLAND BAYS of considerable magnitude, forming a chain, connected with passages of more or less magnitude, which act as receiving basins for the waters from the interior. These Bays are connected with the Gulf by large and prepossessing deep water channels, called rivers, which separate the lands lying Southwesterly of the chain of bays and between them and the Gulf, into islands of greater or less magnitude. These islands in the neighborhood of Chatham Bend River are few in number and contain large acres of land, to the extent of 13 to 15 square miles each, to both the southward, toward Shark River, as well as to the Westward, towards Marco, these Islands become more numerous and to considerably less extent.

These BAYS act as receivers for the waters of the Rivers, rising in and draining the more elevated table lands to the North east and on account of their extent and volume also act as reservoirs for the channels leading to the Gulf, equalizing the tidal flow in these bays and channels to nearly the minimum of variation. The waters of the Bay, on account of receiving such quantities of fresh water from these Rivers cause them to become partly fresh or brackish and at certain seasons of the year when the waters are high in the interior, and the consequent volume received great, these waters may be drinkable.

The main area of this TERRITORY, lying North and Easterly of the receiving basin area, arises in a gradual incline for a distance of about two or more miles. The streams emptying into the bays are well defined, straight and deep. When passing over an under-lying rock ridge extending parallel to the coast, these streams disappear in a mass of small, shallow and intricate sloughs, which find their source in low beds of rushes, (flags) alligator holes, pools, etc. at no great distance from the rock divide. The general direction of all the streams entering these receiving bays, is southwesterly, but those of the easterly portion of this territory flow more nearly in a Southerly direction, emptying into the Lossmans River. The difference between HIGH AND LOW TIDE in the Gulf of Mexico is approximately $3\frac{1}{2}$ feet, at the mouth of the Chatham Bend River, while the difference in the tides within the Chevelier Bay is about six inches; that in "Cator" Pool about four inches, and in Huston Bay about ten inches.

THE DEPTHS OF WATER at the entrance to the Chatham Bend River is from five to six feet at low tide. In the Chatham Bend River,

depths of fourteen to sixteen feet were sounded. A channel of five feet is found to the entrance of Chelevier Bay and channels in Chevelier Bay are about 4 feet deep at low water.

The LANDS laying between the chain of receiving bays and the Gulf of Mexico are, after passing through the fringe of Gulf Coast, Mangrove Swamp, slightly elevated. The average elevation taken in Chevelier Bay is fifteen inches above average high tide. In Tarpon Pool, about 15 inches. In Huston Bay about 18 inches. On the Northeasterly side of this chain of receiving basins, the land terminates at or near the elevation of High tide, in a mangrove fringe and rises a foot or more within a short distance of the shore, from which to the rock ledge it rises at a uniform gradient, ranging height from 3 feet above average High tide, at Dr. Tigere Pass on the Southern boundary to approximately 5 1/2 feet at the Northern part of the property. From the defined line of this Rock ledge this land rises in all directions in a gradient, gradual, undulating slope toward the Northeasterly corner of the property where the estimated height is approximately eight feet.

The CHARACTER OF LANDS upon the islands laying Southwesterly of the receiving basin, and adjacent to the Gulf, presents a fringe of low lying Red mangrove for a distance of several miles, and as the ground elevates, specimens of Black Mangrove are to be found. Between the mangrove lowland and the chain of bays is a large open prairie, about two miles wide and ten miles long, laying in a Northwesterly and Southeasterly direction. This prairie is principally dry, though containing pools of fresh water. It is covered with a heavy growth of

a long, flat bladed grass. The soil is a black, rich, VEGETABLE LOAM of a depth of more than two feet. About this prairie is a dense growth of Palm Hammock, containing cabbage palms, black mangrove, button wood, etc. with a thick underbrush growth of vines, creepers and ferns, from several hundred feet to a half mile in depth. Along the edge of the Bays is again the mangrove fringe, of varying width, from several hundred feet to a mile in depth.

Northeasterly of the Bays, behind the mangrove fringe and between the Bays and the rock ledge, lies prairies similar to the coastal prairies in character of growth and soil, with a similar hammock growth between it and the mangroves. The prairies are studded here and there with hammocky islands, some more or less round and other elongated, containing areas of one-half acre to ten acres in extent. The elongated hammocks usually lie in a Northwesterly, Southeasterly direction paralleling the rock ridge. In this territory there is probably 20% of the land classified as hammock land.

Northeasterly of the rock ledge the character of the country changes; the prairies are of greater extent and hammocks further apart, the hammocks become more elongated and lie in a generally North Northwesterly to south southeasterly direction, containing cabbage palm, button wood, black mangrove, etc. The undergrowth consisting of vines and a variety of ferns. The prairies are more or less moist, dipping from the hammocks toward the centers of the prairies. Flats and rushes border the ponds and sloughs that drain these depressed areas, which as they gather are marked with clumps of fresh water red mangrove, button

wood, etc. marking their path across the prairies. The percentage of hammocks in this section of territory, probably does not exceed 10%. The surface soil along the entire routes consists of a fine, black semi-decomposed vegetable loam of thickness ranging from 4 inches or more in depth over-lying a strata of white silicious sand, to a depth of two feet and more.

The ROCKY LEDGE that extends across this property in a Northwesterly, Southeasterly direction, about $7\frac{1}{2}$ miles from the Gulf Coast is apparently the continuation of the rock ridge that parallels the entire west coast; in this section it is known as the Lossmans River limestone. The stone is a homogenous mass, dark blue in color, showing fragments of shell that has been imbedded in the mass while in its era of construction. This ledge of reef of rock inclines from the northern edge of the property where it is elevated to about $4\frac{1}{2}$ or 5 feet above the sea level to a three foot elevation at or near the Lossmans River. Sample submitted.

Along the Northern border of the central portion of this property, enter a saw tooth formation of cypress, projecting southwardly from the main "Big Cypress" swamp, which extends further to the south as they progress toward the East. These cypress strands are sharply defined and in the interior exhibit a tall timber growth. In the prairie bays or bights that enter between and around the points of the projecting cypress are islands covered with small and thin pine timber.

In detail, in the hammocks lying between the bay and the rock ledge and in the hammock fringe on the southwesterly shore

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13

of the bays are cabbage palm, palmetto, red and black mangrove, and button wood principally, and occasionally live oak, pidgeon, plum, sweet bay, custard apple, dogwood, scrub cypress and wild limes and at rare intervals gum eliami. The undergrowth - jungle vine, grape, Virginia creeper, moon vine, sword fern, palmetto, Boston fern. Of orchids, Tillandsia Fasciculata (oak air plant), Resurrection Plant, etc. wild Vanilla orchid, was noticed in the denser hammocks. Of the grasses - saw grass, round grass, Bermuda grass, flag, etc. Under cultivation, of trees - Coconut, Mango, Avocado, Tamarind, Guava, Mastic, Citrus trees. Of grasses, Banana and Sugar Cane. These cultivated trees were found principally on places under or which had been under cultivation - such as settlements on shell mounds, as at the Watson Place, Lowe Place, Dr. Tigers Place, etc.

Of the growth of the area Eastwardly of the Rock Ledge cabbage palms, black and red mangrove, buttonwood, some custard apple, cypress and cypress scrub and live oak. Virginia creeper, grape and moon vines, palmetto, sword and Boston fern, several varieties of orchids and air plants, etc.

Of GAME, were noted the presence of fish, shark, porpoise, shipwray, grouper, snapper, jack, pompano and pan fish, mullet, whip, bass, gar, cavallio, etc. Large beds of excellent oysters are to be found in the lower end of Chevelier Bay. Coon oysters on main rivers and Gulf. Large and fine olives on bars in Gulf of Mexico adjacent to front of property, alligators, turtle, manatee, terrapin, etc.

Of ANIMALS, deer, wild-cat, occasional bear, wild hog, otter, raccoon, etc.

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14

Of BIRDS - big and little white Herrons. Florida blue and Louisiana Blue Herron. Yellow and Black crested night Herron. Egrets, curlews, large spotted duck. Florida blue billed duck, coots, turnstone, bald eagles, osprey, fish hawk, pelican, owls, wild turkey, water turkey, buzzards, etc. in profusion. The abundance of game in this territory may be attributed to the absence of hunters and trappers. Very few old "burns" were noticed, and none were made save to determine direction and location.

The results of these detailed explorations, observations and examinations, are herewith submitted, viz: --

| STATION | I | 2 | 3 | 4 | 5 | 6 |
|-------------|-------------|-----------------|----------|-------------|------------|------------|
| DATE | 12/18/16 | 12/18/16 | 12/18/16 | 12/18/16 | 12/19/16 | 1/2/17 |
| LOCATION | Dr. Tigers | 3ME\$1 | 3ME\$1 | 5 mls. E\$1 | Ind. Camp | Chevelier |
| TIDE | None | None | None | None | None | 6 inches |
| EL. WATER | 0 | 8" | 1' | 2' | 3' | - |
| " land | 24" | 15" | 12" | 12" | 12" | 15" |
| Char. | Shell Md. | Prairie | Pr. | Pr. | Ham. | Hammock |
| SURFACE | Rolling | Flat | Flat | Flat | Flat | Flat |
| CONDITION | Abandoned | Natural | Nat. | Nat. | Nat. | Nat. |
| SOIL | Decom. sh'l | Rich Black Loam | | Same | Sandy Loam | Same |
| Depth soil | - | 3' plus | Rock 1' | Rock 1' | 2' plus | 3' plus |
| VERDURE TR. | Guava | Grass | Grass | Grass | Palms | Palms |
| " | Mastic | Cabbage | | | Guava | Oak |
| " | Citrus | Palm | | | Fig. | Buttonwood |
| | | Hammock | | | | |
| UNDERGR. | Sugar cane | Grass | | | Vine | Fern |
| | Banana | | | | Fern | |
| | Moan Vine | | | | | |
| GAME | Coon | | Deer | | Deer | Deer |
| | Gators | | Otter | | Dat | Coon |
| BIRDS | Wood Ibis | | Duck | | | Wildcat |
| | Herron | | Coot | | | Herron |
| | Duck | | | | | Duck |
| | Mullet | | | | | Ibis |
| FISH | | Car | | Car | | Mullet |
| | | CavAllo | | CavAllo | | Snapper |
| | | | | | | Oysters |

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15

| STATION | 7 | 8 | 9 | 10 | 11 | 13 | 13 |
|-----------|------------|---------------|--------------------------|--------|-----------|-----------------------|-----------------|
| DATE | 1/3/17 | 1/3/17 | 1/3/17 | 1/3/17 | 1/3/17 | 1/3/17 | 1/3/17 |
| LOCATION | Gater Pool | Al. Bay | Ham. Camp | Pond | Quick Mt. | Ham. edge | Prairie |
| TIDE | 4 | None | None | None | None | None | None |
| EL. WATER | 9 | - | 3'6" | 3'6" | 3'6" | 4' | 3'6" |
| " LAND | 15" | 15" | 9" | 13" | 13" | 4' | 3'6" |
| SHAR. | Pr. | Mango Pr. | Ham. | Pr. | Pr. | Ham. | Scat. Ham |
| SURFACE | Rolling | flat | Flat | Flat | Flat | Flat | Flat |
| CONDITION | Nat. | Nat | Nat. | Nat. | Nat. | Nat. | Nat. |
| SOIL | R.B.L. | R.B.L. | R.S.L. | R.B.L. | R.B.L. | R.B.L. | R.B.L. |
| Depth Sl. | 2' plus | same | same | same | same | same | same |
| VERDURE | tr. Grass | Mang. Palm | Palms Pig. Pea Oak | Gr. | Grass | Palm Oak | Palm Mango |
| UNDERGR. | Ozkes | Grass | Fern Moss | Grass | Grass | Fern Gr. | Palmetto Gr. |
| GAME-An. | Coon | | Coon Deer | Deer | | Deer Coon Cat | Deer |
| BIRDS | | | Dock Ibis Herron | | | Ibis Herron Owl | |

With reference to the above I beg to submit the following samples which may be considered as typical for the entire area.

- #1 - Specimen of prairie soil taken at Station #7.
- #2 - Specimen of Hammock soil taken at Station #9.
- #3 - Specimen of shell mound soil taken at Station #1
- #4 - Specimen of Loessman's Reviere limestone taken between stations 9 and 10.

In conclusion I would state that in my estimation there is about 50% of this land that is subject to inexpensive drainage, 15% hammock and prairie land; 30% Everglades and 15% water, waterways and low lands unfit for agricultural purposes. On account of its tropical situation, its rich and fertile soil, particularly when drained of its surface water, will render ^{this} a most valuable proposition.

Trusting that the information given will meet with your approval, I remain,

Yours very truly, *John W. King*