COMMENTS ON M.R. HAIGS BOOK "INDUS DELTA COUNTRY" 1894, REPRITNED RECENTLY AND ITS SINDHI TRANSLATION TOO AVAILABLE NOW

By M.H. Panhwar

A brief sketch of M.R. Haig and his works.

As Director Survey and Settlement.

Major General M.R. Haig joined in East India Company's service and 1858 was posted in Sindh as Director Survey and Settlement. The Orders of Governor General of India in 1861 facilitated sale of Government land in blocks upto maximum of about 3,000 acres or less at Rs.5.00 per acre for the land ready for cultivation right away and Rs.2.50 for that needing forest and shrub clearance and levelling to the farmers or growers who could cultivate it. In the initial years he had differences with all three Collectors (Deputy Commissioners) of Karachi, Hyderabad and Shikarpur and Political Agents of North Western Sindh (Jacobabad) and Thar and Parker. These officials wanted the Government agricultural land to be distributed to bigland owners, who were helping the administration in maintaining law and order and collection of land revenue, where as Haig was distributing newly released land to the actual tillers of land or those living in the villages surrounded by the new land, made available by extension of irrigation canals, in different parts of Sindh by his own standards of merit. They jointly asked for his transfer, but he had become indispensable to the Government of the Bombay Presidency for his administrative and technical efficiency, which was measured from:

- His thorough knowledge of Sindhi language and communication with farmers in the local language.
- Good scholarly knowledge of Persina to read existing documents specially those pertaining to allotments of land or hereditary land ownership.
- Ability to prepare Deh maps, which ran in many thousands and these formed basis for collection of land revenue as well as distribution of new lands. Maps also showed boundaries of villages, grave-yards, abandoned channels (Bhudas), canals, branch canals, watercourses and formed guide lines for the irrigation engineers to extend the previous dynasties canals, to command more area or make use of old abandoned canals and old river channels.
- Publication of survey of settlement reports of 45 Talukas of Indus Alluvial Plains or the irrigated plains of Sindh, every 10 years. These reports were actually Taluka Gazetteers as

they discussed total area under various crops in each Taluka, yields, prices of crops at farm gate, villages, population, occupations, canals, watercourses, lakes and any other relevant material.

- During his tenure 1858 to probably 1886/87, area under cultivation increased from 900,000 to 1,408,000 acres, an increase of about 54.4%. Credit for which goes partly irrigation engineers, who extended and improved existing canals and partly to him to be able to distribute land to people, who quickly put it under cultivation. To his credit is also the fact that the period 1873 onwards was colder period with 1885 probably the coldest year since the British conquest of Sindh and yet cultivation extended.
- to his advantage was the Great Trigonometircal Survey of India (South-Asia) started by Survey of India which gave stone marks at corners of every square mile and he had to divide every square mile in 40 blocks of 16 acres with stones at corners of each block. The job was done thoroughly with no apparent mistakes.
- He successfully evolved land measurement system and record keeping. An interesting part of the system was Ghat-Wadh form which corrected any mistakes in previous measurements and re-measured, recorded and rectified. The reports settlement reports were printed with some time lag from Bombay. Some 37 reports are available in India Office pertaining his tenure and are listed at the end of this article.

All these reports give an accurate Taluka maps with Dehs, roads, towns, villages, railway lines, canals, branch canals, and etc. This is a mine of information on Sindh, but present records of the Director Survey and Settlement are in shambles. One has to refer the records of Bombay Government at Bombay or at the British Library, London (originally India Office Library). Some reports may not be available at both the places. For the training of mapping and revenue records a Tapedars training school was established at Hyderabad for which also credit goes to him.

The reports to be revised every tenth year were invariably delayed after Haig and were published only once after 1901. After opening of Sukkur Barrage these were abandoned.

M.R. Haig's reports as Survey and Settlement Officer.

- Papers relative to the introduction of Survey rates into Sehwan Taluka, in 1867. Bombay, 1868. I.O. No: V/23/245.
- Selection No: 105, Same for Mora Taluka. 1867. I.O. No: V/23/247.
- Selection No: 108. Same for Kukkar Tooka. Bombay. 1868. I.O. No: V/23/247.
- Selection No: 192. Settlement records of Shahbandar division in Karachi Collectorate, Talukas: Sujawal, Mirpur Bathoro, Jati and Shah Bandur. Bombay. 1889. I.O. No: V/23/270.
- Selection No: 193. Same as above for Talukas: Tatta, Mirpur Sakro, Ghorabari and Malir Tapas of Karachi Collectorate. 1891. I.O. No: V/23/271.
- Selection No: 194. Same for Manjhand, Kotri and Kohistan of Karachi Collectorate. Bombay. 1889. I.O. No: V/23/271.

- Selection No: 195. Same for Hyderabad Collectorate. Talukas: Guji, Badin, Tando Bago and Dero Mohbat. Bombay, 1889. I.O. No: 23/271.
- Selection No.196. Same for Hyderabad Taluka. Bombay, 1889. I.O. No: B/23/271.
- Selection No.198. Same for Hyderabad Collectorate, Sind. Talukas: Naushahro, Kandiaro, Moro and Sakrand. Bombay, 1889. I.O. No: 23/271.
- Selection No. 199. Same for Mehar Division of Shikarpur Collectorate, Sind. Talukas: Mehar, Kakar, Nasirabad and Tigar (Miro Khan), 1889. I.O. No: V/23/273.
- Selection No.200. Same for Shikarpur Collectorate, Sindh. Talukas: Larkana, Labdaria, Kambar and Ratodero. Bombay, 1889. I.O. No: V/23/273.
- Selection No.201. Same for Sukkur Division of Shikarpur Collectorate, Sind. Talukas: Sukkur, Shikarpur and Naushahro Abro (Garhi Yasin). Bombay, 1890. I.O. No: V/23/273.
- Selection No.202. Same for Rohri Division of Shikarpur Collectorate. Talukas: Rohri, Ghotki, Mirpur Mathelo and Ubauro, 1881. I.O. No: V/23/273.

M.R. Haig's publications on history and historical geography of Sindh.

- Haig, M.R., Maj. Gen. (1887), Ibn Batuta in Sindh, JRAS, Vol. XIX, new Series, pp. 393-412.
- Haig, M.R., Maj. Gen. (1887), The Indus Delta Country, Kegan Paul, Trench, Trabner and Co., London. The earlier edition (1887) had only 1st three chapters of the book.
- Haig, M.R., Maj. Gen. (1884), On the sites of the Brahamabad and Mansurah in Sindh with notices on others of less importance in their vicinity, JRAS, Vol. XVI New Series (1884), pp.281-294.

Opinion on the Historical geography in the Indus delta country Haig by M.H. Panhwar.

The work on historical-geography in Sindh dates back to the early efforts of Asiatic Society of Bengal, which in its Asiatic Researches Vol.1 to 20 had tried to find-out the location of various ancient geographical places in Sindh in the first two decades of the 19th century. It was based on study of historical documents without any visit to Sindh. Some 20 years later, Alexander Burnes in his "Travels to Bukhara" Vol. I, 1831, had discussed ancient geography of Sindh. His articles in journals of Royal Geographical society, as well as Royal Asiatic Society, London, give information which can be classified as historical geography of Sindh. Captain E.B. Eastawick a British political officer at Khairpur had great curiosity for ancient monuments and ancient geography and his "Dry leaves from Young Egypt" 1849, was the first book having considerable information on historical geography and monuments of the northern Sindh based on personal visits.

Next was systematic work of Sir Henry Elliot who in "History of India as told by his historians in Vol.1" published from Cape Town (South Africa) describes historical geography of Sindh in 1853, to be followed by henry Elliot and John Dowson's History of India as told by his own

historian" in Vol.1, 1867. It is a detailed account of historical geography of Sindh on which improvements were being made for next 40 years, until Raverty's Mihran of Sindh and Haigs above book. Alexander Cunnigham, the Director of Archaeological Survey of India, published his Ancient Geography of India in 1871 in which Hieun Tswang's travels in Sindh are described. By this year the foundation for the study of historical geography of Sindh, thus was laid. The subsequent 20 years work on historical geography of Sindh was mainly concentrated on courses of the river Sarsuti-Hakra discussed by the present writer in notes on Raverty's Mihran of Sindh, in an article Hakra-Sarsuti controversy. Two important and much discussed and read books of 1890's were, those of Raverty "Mihran of Sindh" 1892 and their Sindhi translation published by Sindh Language Authority and Haig's, "Indus Delta Country", 1894. Haig's book was much referred, discussed and quoted for next 70 years. His stand on Hakra-Sarsuti has been superseded by various authorities as discussed by the present writer in Hhakra-Sarsuti controversy but his other opinions were gradually being superseded and finally by Lambrick's "History of Sindh - a general information". 1964. During past 30 years even some of the findings of Lambrick have been superseded. Haig's views were strong and logical enough, to have influenced every historian of Sindh for next 70 years until Lambrick's work. Even after Lambricks book became available, in absence of its Sindhi translation, Haig's views were accepted by most Sindhi Scholars.

Below is the opinion of the present writer on Haigs book "The Indus Delta Country" and two articles "Ibn Battutta in Sindh" and "On the site of Brahmanabad and Mansura". Haigs opinions on historical geography of Sindh discussed in his book and two articles, to-day stand superseded, but as a general history of Sindh it still has valuable material, which will be referred to for many years. The readers will benefit by the analysis of the present writer, as well as the Lambrick's book above referred to.

On the course of Hakra-Sarsuti, Haig supports version of C.F. Oldham of Survey of India in Calcutta Review 1974, claiming that Sutlej was discharging in the bed of Sarsuti or Ghaggar or Hakra-Eastern Nara. This is not correct and has been discussed by present writer in Hakra-Sarsuti controversy.

His map on courses of the Indus in the southern Sindh is very accurate and shows major courses as they existed from 1300-1758 AD, as it is based on actual depressions and maps of Surveys of India and his own Deh maps.

His coast line of Sindh is based on surveys carried out in 1860s and shown in the map and is accurate for 1860s. Ren a branch of the Indus existed from the end of 14th century to 1758. It was not the main branch. The Baghar was the main branch on which stood Lahri Bander. Gungro was the main branch of the Indus in twelfth and thirteenth centuries. The Western Puran was on eastern branch of the Indus upto 1758 and Eastern Puran (The Puran river in Haig's map) was an eastern Branch of the Indus during Habari rule of Sindh (854-1011 AD), or even earlier.

Badahari Channel shown in his map and considered by him, leading in the direction of Mansura, may or may not be Sindh-Sagara of Alberuni.

Ren river.

The Ren river shown in Haig's map was the central branch of the river Indus and was cut by the river after it deserted Gungro branch which then was main branch in the early 14th century. The Ren branch was deserted by the river Indus in 1758 AD, and newly formed Phuleli branch was diverted into it to irrigate areas from Tando Muhammad Khan to Lowari and further south. The Gungro branch belonged to pre-14th century period.

Advancing of the Indus Delta.

The Delta advances at rate of 3 1/8 mile every year at the main embouchure of the river (Lambrick accepts this version). The Indus silt load discharges into the sea at an estimated at rate of 217 ½ million cu. Yards a year in the nineteenth century. Presently the river discharges into the sea in any year for less than 56 days annually and in some years even for a few days.

Route of Alexander (Chapter-II).

During the time of Alexander the coast line must have been some 25 miles (40 kilometre) inland-wards than is now and Korre Creek too must have been 25 miles land-wards. The eastern branch of it must have entered it around the line running east to west from Karachi or on 25°N latitude. The present writer is of the opinion that the Western Branch of the Indus passed through Bhanbhore then. Bhanbhore has been explored by Dr. F.A. Khan and excavations go back to 1st century BC. The un-excavated starts extend below the water table by about four feet and therefore could not be excavated, but the earliest settlements may well go back to Alexander's times. This also shows that it was colder in Alexander's time and therefore sea level was low. The present author agrees with Dr. F.A. Khan that it may possibly be Alexander's Haven, which remained an active port upto 1224 AD. This identification Alexander's haven by Haig and Lambrick (Sindh a genera introduction pp.100-132) and maps of the coast line drawn by them, therefore may be considered erroneous for location of Alexander's Haven and Debal. However Lambrick's identification of Patala with Brahmanabad appears to logically correct, as the same settlement survived from 5th century BC, first in the name of Brahmanka capital of Brahmanka Parguna in the Central Sindh on the left bank of the river Indus as per statement of Panini the Sansikrit Grammarian and was destroyed in 1026 AD, as reported by archaeologist Halim. The two branches of the river Indus have been drawn by the present writer along with principalities of Sindh conquered by Alexander the Great in a map appended. On the same basis Lambrick's location of various sites of Nearchus on Sindh coast at the best is an intellectual guesswork, based on approximations of distances travelled.

Country of Patalene according to later Greek accounts (Chapter-III).

Haig has discussed Patalene as mentioned by "Periplus of the Erythean Sea", written around 60-80 AD, and by Ptolemey the geographer's map of 140 AD, and also Barbarican or Bhanbhore an inland port on a branch of the Indus. It is not only probable but definite that at the delta the Western branch of the river Indus within the length of 16-20 miles from sea will bifurcate into two or three branches making the Barbarican port on the central branch. Excavations of Bhanbhore have proved that it was a sea port of not only of an importance but also a permanent port on the Indus for about 1300-1400 years from atleast 1st century BC, to 1026 AD. Haig though not correct on location of Patala (Brahmanabad), gives correct alignment of the western branch of the Indus passing near Samui (north of Makli Hills) and through the Gharo Creek. Lambrick does not think that any branch of the Indus passed through this channel during the era under question. Arial photographs and satellite imagery have proved with certainty such a branch. However both Haig and Lambrick are not correct on location of Debal (Bhanbhore).

Minnagara of Periplus is un-recognisable to Haig, but if we accept Haig's own quotating of Tuhafatul-Kirams version about Minagar in Shahdadpur Pargana, it became obvious the Minnagara was another name for Brahmanabad, the only large town within many small ruined settlements around it. Haig accepts Gharo or Bhanbhore Creek as the most western branch and Koree Creek as most easternly branch of the Indus and he assigns the names Sagapa and Lonibare of Ptolemy to them. This statement of Haig is correct. Further to it may be mentioned that Lonibare (Loonnibari) may have come from Sindhi word Loonn or salt, due to salty water of Rann of Kutch nrear by. The second mouth of Indus from the west called Sinthon may be Sindhu or the Indus, the main channel.

I have discussed the modern names of sites mentioned by Ptolemy in a map in Chronological Dictionary of Sindh. I have discussed Ptolemy, his geography and location of places in Sindh in "A Social History of Sindh" not published as yet.

Sindh according to Hieun Tsang (Chapter-IV).

On the travels of Hieun Tsang are; the works of Cunningham, Director Archaeological Survey of India, "Ancinet Geography of India", Cousens "Antiquities of Sindh", Raverty, "Mihran of Sindh", Pithwalla "Historical Geography of Sindh" and Lambrick "Sindh A General Introduction". Of various versions, I have accepted the last. Lambrick also does not agree with Haig's interpretations (Lambrick pp.146, 148).

Debal (Chapter-IV).

Haig has located Debal in Deh Kakar Bukera, Dr. F.A. Khan's Excavation of Bhanbhore has proved beyond doubt that, this town flourished at least from first century BC, or even earlier (if un-excavated lower level are considered) to 1228 AD, as a harbour and important city. The earlier interpretations of Elliot, Cousens, Pithawalla and many other authorities including Lambrick stand superseded. His contention that Kalri branch of Indus passing through Samu

gap was not continuous upto Gharo Creek at the time of Arab conquest of Sindh is incorrect, as Bhanbore (Debal) a sizeable city could not have survived due to brackish water within many miles around it.

Eastern branches of the Indus.

On the courses of the eastern branch of the Indus, as well other branches in the delta, Haig has created confusion, except for the branches given in his second map showing change of the river course in 1758.

Khanwah mentioned by him was a part of Kalri branch passing north of Thatta.

Nirun.

Haig's contention that Nirun was at present site of Hyderabad and was getting water from the river Indus 16 miles east of it, only in the inundation season does not appear to be correct. This statement in it-self justifies that a city which has brackish ground water within 10 miles radius all around it even to this day, could not sustain it-self and has to be abandoned. It seems that Nerun may have been at the southern end of Ganjo Takar Hills and more than 10 miles South of the present Hyderabad. However almost until this day every one seems to believe that Neurnkot was Hyderabad, basing on presence of Shah Maki's tomb in Kacha Killa the antiquity of which has not been verified. City of Hyderabad is expanding since 1900 AD and in excavating foundations no debris or artefacts of old city have been found.

Route of Muhammad Bin Qasim march to Sehwan (Chpater-IV).

Haig is justified that Muhammad Bin Qasim marched on Sehwan from Neurn via Thano Bula Khan - Jhangara route is correct. This route was frequented since pre-Amrian trimes and at least from 4,000 BC, onwards until opening of railways upto Sukkur and Shikarpur in mid 1870s, as water is available along the route from springs at every 5-10 miles, right upto Jhargars. Lambrick has also accepted the same version. Present writer in search of ground water has located more than 20 springs along this route and some important ones of which are at; Jhangri, Osman Buthi, Bachani, Ahmed Shah, Arabjo Thano, Shah jo Thau, Khajoor, Karchat, Pokran Landhi, Dhal, Chauro, Bandhri, Dam Buthi and many others in a distance of 70 miles along the route. Any army can easily traverse this route have water and fodder and yet be safe from the enemy attacks.

Budhia country.

Haig identifies Budhia country as hilly country to the west of Sehwan, Sisam with Shah Hasan and Kaikaraj with Kakar. Lambrick does not agree with him and considers Budhya country from Kakar to Sibi.

Kakar is a recent town. Its importance lay in being a town on road from Dadu to Larkana via Khairpur Nathan Shah survived due to its locations on Western Nara and later on Prichand canal and Johi Branch. It did not exist between 1600-1700 AD Budhia could be Sibi-Kachhi and northern western parts of Jacobabad and Shikarpur district with Kandabil (Gandhara) as main town. Lambrick does not agree with him, who feels that Sisam was not Shah Hasan but some where near Kakar (Lambrick p.156).

Baghrur.

Haig identifies Baghrur with Bakhar. Lambrick agrees with him (pp.158, 163). It was believed that the Indus came to pass through Bukhar gorge some time in the tenth century and it never passed through Alore gap. Arial photographs have ascertained that a branch of river Indus did pass through that gorge. It also passed through Sukkur gorge and according to Wilhelmy some quantity of water also passed through Sukkur gorge since around 1,000 BC, but the whole river came to pass through it only after 950 to 1200 AD. Panini the grammarian who lived in the beginning of fifth century BC, has mentioned a town of Sarkara on the right bank of the river Indus. Panini's Sarkara is probably Sukkur. Sukkur/Bukhar were identical in medieval times and Persian writers called it Bukhar.

Crossing of river Indus by Muhammad Bin Qasim.

On the location of crossing the river Indus by Muhammad Bin Qasim, Lambrick does not agree with Haig and considers the crossing, at a point with parguna of Jhim Jhimpir) to the west, Bet to the south and crossing point near Rawar (Talhar?), from which he marched north to Brahmanabad via Bahrur (Tharri?), Dhaliya (Mirpurkhas Stupa?) Wahahtiah (?). These may be approximate locations, as we do not hear of Tharri until mid 1048 AD, and no excavation have been done to find antiquity of Talhar and Tharri.

Junaid's battle with Jaisina son of Dahar.

There is detailed account not given by Haig but discussed by me in Chronological Dictionary of Sindh, how Jaisina recovered Eastern Sindh from Arabs in 715 AD, and ruled it until 725 AD, and how he was defeated and killed by Junaid in a naval battle on a lake. Haig identifies this lake as Rann of Kutch. Some have thought it to be lake Samara in Taluka Samaro. In my opinion the lake was Makhi-Farash. It was filled by spill waters from the Indus and the Sutlej via Hakra or Eastern Nara and a branch from this lake was flowing east of Brahmanabad-Mansura.

Eastern geographers on Central and Lower Sindh (Chapter-V).

There has been adequate work on the Arab maps of Sindh, starting with Elliot in 1853 to this day. Among the important contributors are Raverty, Haig, Cousens, Pithawalla and Lambrick. In the Chronological Dictionary of Sindh, I have given equivalents of Istakhari and Ibn Haukal's geographical names and their locations on a modern maps. I have written a detailed comment on Arab maps in "A Social History of Sindh, Vol-I" and also in "An Illustrated Historical Atlas of Sindh".

The defects in Arab maps are:

■ Most of them were really not geographers in the strict sense of the word, as they were travellers, merchants and sea-men. They contributed but very little to cartography an essential basis for the development of geography. None of them used longitude and latitude or parallels and meridians as basis for location of a place, as Ptolemy (150 AD) had done 800 years earlier. Ptolemy described the World surface then known with the greatest accuracy, but under estimated distance between Europe and Indies. He was the first to use the term parallels and meridians, not used by the Arab geographers until Idrisi (1150 AD). Ptolemy had collected his information from merchants and mariners, who used those scientific measures as a guide.

On through examination of Ibn Haukal and Istakhtri's maps of Sindh, the following defects in these, become apparent:

- The river Indus flow is shown as a straight line from north to south direction.
- Sindh coast is almost a straight line running east to west.
- Boundaries of the province run in perfect straight line and make a ninety degree angle when there is change of direction.
- Tributaries of the Indus meet in a perfect are of a circle.
- Northern boundary of the province is a perfect semi-circle.
- The roads run in a straight line. They usually make 90° or about 45° angle with the border.
- There is no delta head of the river, nor does it split into a number of branches to discharge into the sea. Seven mouths of Indus were recorded by Ptolemy.
- The distance between the places are described in days journey, marshals and farsangs for which no standards had ever been laid.
- Such cartography makes recognition of many places impossible.

Samani.

Haig quoting Chach Namah infers that word Samanis may refer to Buddhists holding position of authority as well as monks and devotees. In the opinion of present writer Samanis mean Samma or Samat a tribe to which majority of Sindhis belong even to this day. They were Buddhists at the time of Arab conquest.

Manjabari.

It was a place three days journey from Sehwan and two days from Nerun and also place close to Brahmanabad and is probably eroded and buried. There is another Manjabari mentioned by Arabs two days journey from Debal (Idrisi), on road from Debal to Makran. This place cannot be other than Manghopir.

Kalri.

There is a town Deh named Kalri in Nawabshah district about ten miles NE of Sakrand and Haig is the first to have located it.

Tharri, Tur.

Haig has correctly located Tharri, on the right bank of Western Puran 6 ½ miles south-east of (Muhabat-Dero), the Soomra Capital established in 1048 AD. he has also has correctly located ruins of Tur (Muhammad Tur) on Gungro branch (now a canal) and survived by a village Shah Kapur (from Tur), Samui and Kalankot (Tughlaqabad). He has correctly located Samui, a Samma settlement of 13-14th century, on the left bank of Kalri branch of the river Indus and the same is the case with kalan Kot which was founded or perhaps restored from an earlier settlement by Sammas. Samui lies at the northern end of Makli hills east of Jungshahi-Thatta road.

Lahri Bander.

Haig has located Lahri Bander ruins on Baghar Branh, some 20 miles WNW of Sakro and 13 miles SW of Bhanbhore. Present writer feels that just as in a century and half, Keti Bander site was shifted on the down stream side by 8-10 miles, any port on any branch of the Indus was not stable, except Bhanbhore the stability of which came from Kalri branch flowing through a gorge near Samui and also through Bhanbhore gorge. The Lahri Bander therefore shifted with every river change and a number of sites considered as Lahir are all Lahri Banders of different periods from eleventh to seventeenth centuries, when a new port was called Auranga bander around 1650 AD. In a century another port Shah Bander came up in 1760s to be followed by three to four sites of Keti Bander. It may further be mentioned that Debal or Bhanbhore was not the only port of Sindh and Lahri though second in importance to it, existed from early 11th century and mentioned as Lahrani by Beruni. Haig thinks that Loharani is from Lahore and it means port of the Punjab and Sindh. This contention is not correct as the port was called Larhi in Sindh which, word came from Lar or the Lower Sindh, now commanded by the Kotri Barrage. Iranian in the 7th century AD, called Arabian sea Bahr Larvi or Sea of Lar, a name which came to be assigned to it from beginning of fifth century AD, as mentioned by Mukerjee in "Indian Shipping".

Irrigation under Sammas (Chapter-VI).

Haig has correctly assessed achievements of irrigation under Sammas. The details of Their canals which survived well into this country are discussed under the present authors' "Six thousands years History of Irrigation in Sindh" and names of new canals and lakes from which they took of are; Mir Abro wah, Khanwah Darya Khan's canal connecting Nari, Bhuri and Naing with Manchar Lake, Swah or Saurah wah, Khani and Naing springs used as cnaals, Marui canal from Maha Lake in Khairpur Nathan Shah Taluka to Deh Marui near Ibrahim Kachi village Taluka Dadu, Bolan Nai reached Manchar Lake and its waters were directed by two canals Sarwah and Moz Wah in Sibi-Kachi Districts, Hakra carrying spill waters of the Indus and the Sutlej and ending in Makhi-Farash lakes and down to Koree Creek, Chaneja wah in Thatta district, Sabzah wah near Aghamani in Matli Taluka, Katira wah in Thatta district (on it were settled Ganhwar tribe), Nahan wah on Puran branch of the river Indus, Talao Sahta in Nawabshah district, Tarangchi Kolab in Nasarpurarea, Tarabari Kolab in Nawabshah district, Jharani, near Shah Garh fort in Nasarpur area, Ren Agham, probably a canal in Matli taluka near Aghamani, taking off from Ren river, Saran Kolab in Badin district, Samrah Kolab or lake Sammaro which existed until recently, Ma'ahood Kolab in Sammaro taluka, Pakhar Kolab in Badin Taluka, close to Puran, Lanbah Kolab (Lake Umerkote), Nihan Wah, located either in Alore Parguna or on Puran near village Pur, Spanah Wah 4 miles from Thatta, as reported in Tarkhan Namah, by Syed Jalal. I have given a list of Soomra-Samma canal in "An Illustrated Historical Atlas of Soomra Kingdom 1011-1351 AD".

Kahan.

Haig has correctly located Kahan in Baghban Parguna is now called Gaha and still exists west of Bhan-Saeedabad. Seth Noomal had lands in that village. It was birth place of Abul Fazal and Faizi and very fertile area on a western Branch of Indus from Radhan to Talti in the fifteenth and sixteenth centuries and later on the Western Nara. The western branch had Talti on its left bank. Talti lake exist new as it did in the sixteenth century and has always been used as a escape lake for flood waters from Sindh Hollow and occasionally by Gaj, when they are in spate, as had happened in 1942, 1948, 1956, 1973 and 1995.

Pat, Jun, Feteh Bagh.

The location of the three is correctly described by Haig.

Was the Ren River perennial in the fifteenth to eighteenth centuries?

It was not a perennial channel as claimed by Haig and as correctly assessed by Lambrick (p.189). Had it been perennial, it would have had a permanent port built on it. As against it Baghar was perennial, on which flourished Lahri Bander. Haig is not correct in this assertion. Ren took off a few miles east of present Tando Muhammad Khan and taking alignment of present Phuleli canal discharged in to sea via Shakoor Dhandh. Both Haig and Lambrick think

that it discharged via Koree Creek. Surveys carried out by the present writer's team for drainage of L.B.O.D main channel, showed that Shakoor Dhandh would be most logical entrance to the sea for Ren.

Roshanai, Ronai.

Haig based on his Survey and Settlement maps, has correctly located Roshanai in Tando Muhammad Khan Taluka.

Location of San.

Haig considers San 4-6 miles north east of its present locations at end of sixteenth century. It is true that location of Manjhand and Unarpur has changed and the two have been shifted three to four times since sixteenth century but not San. San still has graves of Syed Hyder great grand father of G.M. Syed, who lived at the end of fifteenth and beginning of sixteenth centuries and his descendants also live close to his grave. San is saved by river San a rainfed steam, which discharges large quantities of waters in the rainy season and some times over 25,000 cusecs with high velocity in the river Indus, cutting the left bank towards Sakrand. The Indus therefore has a permanent S-curve near San with low point on opposite Bank. Therefore only the San river can erode San and not the Indus. Haig is however right about different locations of Unarpur (p.109). I had discussed on location of San with Late G.M. Syed in January 1965 and he confirmed that San exists there, since its foundation by his fore-fathers.

Ghar.

Haig asserts that Kalhoras dug Ghar canal. Ghar appears to be an ancient channel of river. No canal in Sindh at any stage including the Eastern Nara was as wide as Ghar in the eighteenth century. It is silted now and in mid thirteenths was crossed by a boat.

Campaign of Imperial force of Akbar in 1591-92.

I have drawn a map of the route of Abdul Rahman Khan-e-Khana correcting location some of sites described by Haig. In general his identification of sites is correct.

Muhammad Tur.

Muhammad Tur was destroyed by Nusrat Khan a general of Allauddin Khilji in 1297 AD, as stated by Haig, though site has not seen archaeologists spade.

Lonibare.

Lonibare may also have come from Luni river which discharges in the Rann of Kutch and also discharged its waters through Rann to sea via Korre Creek in old days but not in the past 800 years.

Appendix (Ancient Course of river Indus in Sindh).

Haigs theory on the courses of Indus and Hakra-Sarsuti has been superseded by Lambrick in "History of Sindh - Generl Introduction" and my article "Hakra-Sarsuti-Drishadvati" Published in J. Singholocial Studies, as well as J. Ancient Sindh be referred to.

Appendix-E March of Arabius.

For Alexnader March through Sindh and Lasbella, Haigs version has been superseded by Lambricks version, which states that he moved from Patala (Brahmanabad) to Thano Bula Khan to the junction of Mol and Khadeji and thence to Hab Chawki and then via Soan Miani to Rhambaka. He may have touched Manghopir.

Appendix-F, route of Nearchus from Alexander's Heaven to the mouth of Arabius.

Alexander's Heaven could be none other than Bhanbhore and based on that I have drawn the line of voyage of Nearchus in a map in Chronological Dictionary of Sindh without naming the various stations, as in absence of archaeological work, identification of various sites is purely a guess work.

His other works are:

- (i) Ib-Battutta in Sindh, J. Royal Asiatic Society of Great Britain 1884.
- (ii) On the site of Brahmanabad and Mansura.

The last one has been commented by me in my aritcle "Location of Brahmanka, Patala, Demetrius, Minggara, Brahno, Brahmanva, Brahmanabad, Dalurai and Mansura, published in Sindh Quarterly.