QR Coding Of 20 Large Trees of PG Botanical Garden RG PG Autonomous College Ambikapur Surguja CG India.

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Abstract- Social forestry has innovative information technology, as a QR coding of essential trees. Plant Taxonomy is the Botany of Identification, classification, and application. The application of Information Technology in Plants Identification and Characterization is the “Quick Response” (QR). QR code is Quick Response Code in which all desired information is encoded in a small square area. And it is decoded by QR code Mobile application and all data appears on the screen of the mobile. QR coding of twenty Large trees of Botanical Garden RGPG Autonomous College Ambikapur Surguja CG India and Methodology Significance and further Scope is discussed.

Key Words: Quick Response Code QR Coding, QR of Tree, QR in Social Forestry, QR in Taxonomy.

INTRODUCTION:
The National Information Industrial work force of India did compulsory for all products to have barcode on packaging to be fast billing at shops. Barcode has black lines of various thickness and gapping with below some numbers and Information remains in the middle portion of the bars. When bar code is read by laser beam black lines absorb the laser light and white gape portion has information where laser light reflects and information of product like name quantity cost etc are decoded in connected computer screen and time is saved for billing. But this system has very less information and there is need of laser light source. In the world of cell phone to code to the large information was uneasy. There for QR code is invented for more information of company, product, bank account, railway information etc [1]

In Maihar Satna, MP, all big trees are being attached with their QR code with the collaboration of Forest Dept. Education Dept and Information technology dept. (2) There is a revolution in all over the world make QR code in commerce, culture, transport, Examination, Health, Society, And Education sectors.(3, 4, 5). The trees of Kerala State Governor House and parks of Kerala art attached with their QR Codes, Having information of local Hindi English and Botanical names and Importance of the tree.(6, 7).

HISTORY OF INVENTION OF QR CODE:

MORSE CODE: Figure1 represents the Morse code invented in the year of 1830 by Samuel F B Morse. Morse has a system of Dots, Dashes and space use to represent Alphabet, word, Numerical and punctuation marks used for electrical Telegraphy. These codes were sent to be typed by electrical signals. Morse code need Electrical Signal and Telegraphy System From this Bar Code is evolved.[9]

BAR CODE: Figure2 represents to a bar code. It has information on black is not scanned and white lines reflects to light. Barcode was invented by Joseph Woodland and Bernard Silver in 1940 and popularized by Allen Haber man. The National Information Industrial work force of India did compulsory for all products to have barcode on packaging to be fast billing at shops. Barcode has black lines of various thicknesses and gapping with below some numbers. The information remain in the middle portion of the bars. When bar code is read by laser beam black lines absorb the laser
light and white gape portion has information where laser light reflects and information of product like name quantity cost etc are decoded in connected computer screen and time is saved for billing. But this system has very less information.

QUICK RESPONSE CODE: QR code is invented for more information of company, product, bank account, railway information etc. It is in small square form and operated simply in cell phone with QR application Figure 3 represents a QR code, it was invented in Japan by an Engineer Massahiro Hara in 1994. He was Japanese graduate Engineer in Hosei University invented we code for the company Denso Wave. Mara’s team’s task was to create a barcode that could easily track automobiles and automobile parts during manufacturing. So that, they invented the QR code. But they did not expected it to be used outside of the automotive industry in many sectors.

MATERIAL AND METHOD:
GPS COORDINATION OF STUDY GARDEN Geographically, Ambikapur is a great city consisting of southern extension of Chhota Nagpur plateaus and northern stretch of Maikal mountain ranges and numerous hills hillocks like Mahamaya hill, Pilkha hill Mainpat plateaus which is drained by Baki, Pilkha and Ghungutta reverts along with Renu and Kanhar rivers. RG PG Autonomous College Ambikapur is situated at Manendragarh Road NH 43 at the origin of SH-2 Kashi Road. GPS Coordinates 23.1342571N, 83.1796248E and Altitude is 580m. There are two Gardens and a tree belt in the College. There the Tree’s were QR code tagged. WE followed following steps:

1. At first Authors visited to the site and enlist trees of then PG Botanical Garden of RG PG Autonomous College Ambikapur Surguja CG 497001 India, and made a list of trees.
2. Author collected Taxonomic and economic characteristics from plant encyclopedia HM Laurence’s taxonomy of vascular plant and Bioelectricity and Taxonomic Table

Table 1 represents the Taxonomic information 20 trees. Then the Wave Site: https://www.qr-code-generator.com/free-qr-code-creator/ is opened and made clicked to text then reformatted from the table one for example:

<table>
<thead>
<tr>
<th>Srl No</th>
<th>Hindi Name</th>
<th>English Name</th>
<th>Botanical Name</th>
<th>Inflorescence</th>
<th>Placentaion</th>
<th>Fruits</th>
<th>Use</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Sarayi</td>
<td>Sal</td>
<td>Sorea robusta</td>
<td>Grouped Raceme</td>
<td>Perital</td>
<td>Samara</td>
<td>Fruits Edible</td>
</tr>
<tr>
<td>2</td>
<td>Bargad</td>
<td>Banian</td>
<td>Ficus Benghalensis</td>
<td>Hypanthodium</td>
<td>Axile</td>
<td>Synconus</td>
<td>Elephants Fodder</td>
</tr>
<tr>
<td>3</td>
<td>Pipal</td>
<td>Boe</td>
<td>Ficus religiosa</td>
<td>Hypanthodium</td>
<td>Axile</td>
<td>Synconus</td>
<td>Elephants Fodder</td>
</tr>
<tr>
<td>4</td>
<td>Aam</td>
<td>Mango</td>
<td>Mengifera india</td>
<td>Penicled Cyme</td>
<td>Basal</td>
<td>Drupe</td>
<td>Edible for Vitamin A</td>
</tr>
<tr>
<td>5</td>
<td>Ashok (Ornamental)</td>
<td>Ashok</td>
<td>Poliantha longifolia</td>
<td>Dichasial Cyme</td>
<td>Marginal</td>
<td>Eterio of Berry</td>
<td>Ornamental</td>
</tr>
<tr>
<td>6</td>
<td>Ashok (Medicinal)</td>
<td>Ashok</td>
<td>Saraca indica</td>
<td>Axillary Cyme</td>
<td>Marginal</td>
<td>Legume</td>
<td>Medicine of MC problem</td>
</tr>
<tr>
<td>7</td>
<td>Yimalee</td>
<td>Tamarin d</td>
<td>Tamarind us indica</td>
<td>Axillary Cyme</td>
<td>Marginal</td>
<td>Legume</td>
<td>Sour cheese</td>
</tr>
<tr>
<td>8</td>
<td>Semal</td>
<td>Cotton tree</td>
<td>Salmalia malabarica</td>
<td>Axillary Cyme</td>
<td>Axile</td>
<td>Capsule</td>
<td>Ornamental/ Root medicinal</td>
</tr>
</tbody>
</table>

Table 1. TAXONOMY OF TRRES OF PG BOTANICAL GARDEN.
<p>| | | | | | | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>9</td>
<td>Bell</td>
<td>Wood apple</td>
<td>Eagal mermelas</td>
<td>Rutaceae</td>
<td>Axillary and terminal Cyme</td>
<td>Amphi saraca</td>
<td>Fruits medicinal at decency</td>
</tr>
<tr>
<td>10</td>
<td>Sheesham</td>
<td>Rose wood</td>
<td>Dulbergia sissoo</td>
<td>Paplionatae</td>
<td>Grouped Axillary</td>
<td>Marginal</td>
<td>Lomentum</td>
</tr>
<tr>
<td>11</td>
<td>Amla</td>
<td>Awla</td>
<td>Phylenthus ambelica</td>
<td>Euphorbiaceae</td>
<td>Cyatham</td>
<td>Axile</td>
<td>Schyzocarpic Capsule</td>
</tr>
<tr>
<td>12</td>
<td>Rubur</td>
<td>Rubur</td>
<td>Hvidia brasilensi s</td>
<td>Euphorbiaceae</td>
<td>Cyatham</td>
<td>Axile</td>
<td>Schyzocarpic Capsule</td>
</tr>
<tr>
<td>13</td>
<td>Neem</td>
<td>Neem</td>
<td>Azzadirica indica</td>
<td>Meliaceae</td>
<td>Axillary</td>
<td>Penicle</td>
<td>Axile</td>
</tr>
<tr>
<td>14</td>
<td>Casurina</td>
<td>Casurina integrifolia</td>
<td>Casurinaceae</td>
<td>Ketkin</td>
<td>Perital</td>
<td>Samara</td>
<td>Xerophyte study</td>
</tr>
<tr>
<td>15</td>
<td>Eucalyptus</td>
<td>Eucalyptus citridiodora</td>
<td>Myrtaceae</td>
<td>Spikes in Raceme</td>
<td>Axile</td>
<td>Capsule</td>
<td>Leaf oil is Medicinal</td>
</tr>
<tr>
<td>16</td>
<td>Katahala</td>
<td>Jack Fruits</td>
<td>Arctocarpus integrifolia</td>
<td>Moraceae</td>
<td>Axillary</td>
<td>Raceme</td>
<td>Axile</td>
</tr>
<tr>
<td>17</td>
<td>Mahuwa</td>
<td>Dori</td>
<td>Madhuca indica</td>
<td>Sapotaceae</td>
<td>Grouped cyme</td>
<td>Axile</td>
<td>Drupe</td>
</tr>
<tr>
<td>18</td>
<td>Baheda</td>
<td>Baheda</td>
<td>Terminalia belarica</td>
<td>Combretaceae</td>
<td>Grouped cyme</td>
<td>Axile</td>
<td>Capsule</td>
</tr>
<tr>
<td>19</td>
<td>Gulmohar</td>
<td>Delonix regia</td>
<td>Saesapinioidae</td>
<td>Dichlasic Cyme</td>
<td>Marginal</td>
<td>Legume</td>
<td>Ornamental tree</td>
</tr>
<tr>
<td>20</td>
<td>Gulayichi</td>
<td>Plumeria acutifolia</td>
<td>Apocynaceae</td>
<td>Dichlasic Cyme</td>
<td>Axle</td>
<td>Abortive</td>
<td>White flowers</td>
</tr>
</tbody>
</table>

0. Introduction 1 Sarayi 2 Bargad 3 Pipal 4 Aam 5 Ashok (ornam) 6 Ashok(Medicine) 7 Yimlee 8 Semal 9 Bell
3. We 5G data and downloaded QR code generators application: https://www.qr-code-generator.com/free qr code creator/#info dynamisch. We set on Static QR and On text box we put right click to display the text, then we Pasted the formatted information and clicked to box ‘Create QR Code’. Then on right side QR code is generated. We down load it. If it did not appeared we right click on figure and clicked to open in a new screen. A new page is opened we clicked on upper dialog box and in a new page QR Code is appeared. It is Saved with proper serial and Name. Thus the QR code is generated.

RESULT AND DISCUSSION:
Figure 6 represents created QR Codes of the Garden, 20 trees and Philosophical society. It is twice checked Printed in white and black Laminated safely and tagged on the stem of the respective tree at the height of 5 feet. Attachment to tree and serial numbering for indexing and recheck post implant Code is Important and it is a team work.
There are two type of QR Code, first is Static QR Code Storing less Data, Like Name of Article Manufacture and Expiry Date company name and cost and etc. Second type is Dynamic QR Code, Linked to wave site GPS location, Operating System, and more informations along with all information of static QR code linked with company wave site, or Gmail.

MERIT AND DEMERIT OF QR CODE:
MERITS: 1 These QR codes are now widely used in business, healthcare, transportation, and education.
2 As they are omnipresent, they are placed in posters, brochures, flyers, magazines, window panes, newspapers, product labeling, business cards, and social media posts.
3 Cost-efficient, there are some wave sites offer to free create QR codes. and More information in small square may be displayed.
4 It is easy to create and Can hold different multimedia formats in Dynamic QR Codes. Through it, people can still scan the QR code even if it gets damaged due to natural or man-made occurrences.
5 One great thing about QR codes is that people can scan them with their smart phones and access the content online. Because of this, accessing a piece of information from a QR code is within your reach.

DEMERIT: 1 Lack of familiarity: As much as they are welcomed in Asia, QR codes are not given importance by the Western part of the globe. Because of this problem, some people have doubts about using them.
2 Advertisers tend to misuse them: As advertisers improperly use QR codes, people see the
incompetence QR codes make and create negative impressions of them. As a result, people are avoiding them and may never want to give QR codes a chance for them[20].

FURTHER SCOPE OF THE STUDY: QR code of tree is yet not plant bioelectronics. But refer as Phyto information There be such electronic chip with microphone on branch ( at safe place).that from remote or touch to sound Namaste, it’s name. and other feed information. Also, when draught, it must sound an alarm and say of oxygen donation by plants, whenever any harm it. At this working should be Floral formulae and full Classification with all hierarchy.

CONCLUSION: QR Codes of twenty trees were made namely 1 Sarayi, 2 Bargad, 3 Pipal, 4 Mango, 5 Ashok(ornamental), 6 Ashok(Medicinal), 7 Yimlee, 8 Semal, 9 Bell, 10 Heesham, 11 Awanlaa, 12 Rubur, 13 Neem, 14 Casurina, 15 Ecalyptys, 16 Katahala, 17 Mahuca, 18 Baheera, 19 Gulmohar, and 20 Gulayichi. There were tagged QR Codes on the respective Trees. Q R Codes of The Botanical Society and Philosophical Society are also created.

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REFERENCES: