**PERSONAL ASSISTANCE FOR SENIORS WHO ARE SELF-RELIANT**

**IBM – LITERATURE SURVEY**

**UNDER THE GUIDANCE OF**

**Name of the Industry Mentor: Mr. Baradwaj Arvapally**

**Name of the Faculty Mentor: Mr. Prakash Narayanan**

**SUBMITTED BY**

**V.JAYARAHUL - 611819104018**

**T.S. KAVIN - 611819104022**

**M.GANGADHARAN - 611819104015**

**C.SRINIVASAN - 611819104047**

STATEMENT:

* The study proposed,Unobtrusive Biosensors, Intelligent Medical Boxes, and a Cloud Computing Architectural Framework. Amongst other technologies and advancement that would pitch the HealthCare Industry to unparalleled heights in terms of efficiency and Patient Comfort.
* The paper proposes to revolutionize the industry by real time exchange of data to seamlessly and proactively offer prediction, diagnosis and remedies.
* The framework this paper proposes is aptly called the Internet of Medical Things (IoMT) which opens a whole new avenue for the Patient-HealthCare provider Interface (PHI) and Wearable Health Technology (WHT)
* A comprehensive survey of IoT- and IoMT based edge-intelligent smart health care, mainly focusing on journal articles published between 2014 and 2020.The systematic review process PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analyses) to identify studies and narrow down results for this review.
* The proposed medicine box helps the patient to take the right medicine at the right time along with an email which will help the patient to take the medicine. Server for storing medication time and other information, mail transferring protocol, temperature sensor for proper monitoring of patient body temperature has been integrated in this project.
* The researchers had developed a complete model of monitoring patients at regular intervals through an interconnected network among the doctors, nurses and patients with a view to minimizing the workload of the doctors and nurses, reducing the chances of medical professionals being infected by COVID-19 type of contagious disease and increasing the overall efficiency of patient monitoring in hospitals.

Advantages:

• Keep track of their medication.

• Consumption patterns, receive reminders to.

• Consume their medications.

• Pill restock alert will alert close contacts

• Added level of security.

• Multiple methods of reminding use.

Limitations:

• Lack of health apps integration.

• Absence of voice reminder.

• Not cross-platform.

• Absence of self-deployed cellular connection.

REFERENCE:

* Upl-ltd.com
* UPL- Agriculture solutions & services provider

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| TITLE AND AUTHORS | | YEAR | TECHNIQUES | | FINDINGS | | PROS&CONS | |
| Bhatia, H., Panda, S.N. and Nagpal, D | | 2020 | IoT Technology | | Internet of Things and its Applicationsin Healthcare-A Survey. | | 8th International Conference on Reliability, Infocom Technologies and Optimization (Trends and Future Directions) (ICRITO) (pp. 305-310). IEEE. | |
| Alkandari, A. and Almutairi, N. | | 2019. | IoT Technology | | Smart medicine drawers using IOS application and Arduino board | | International Journal on Perceptive and Cognitive Computing, 5(2), pp.59-65. | |
| Kumar, S.B., Goh, W.W. and Balakrishnan, S. | | 2018 | Smart Instance based on IoT Technology | | Smart medicine reminder device for the elderly. | | In 2018 Fourth international conference on advances in computing, communication & automation (ICACCA) (pp. 1-6). IEEE. | |
| Phinto, Shandro, Jorhge Caabralle,&T. Ghomes | 2017 | | | IoT based Medical System,Technology | | "We-care: For elderly people, an IoT-based medical system." | | In2017,IEEE International Conference on Industrial Technology (ICIT),pp.1378-1383. IEEE |
| Basanta, Haobijam, Yoo-PhingHeuang,& Tssu-Tiann Lee | 2016 | | | Health service IoT based Technology | | "Reasonable H2U health service focusedon IoT,for senior citizens." | | In 2016 IEEE 13th International Conference onNetworking, Sensing, andControl (ICNSC), pp. 1-6.IEEE. |