A picture containing text, clipart

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**LAWN CARE PLUS WORK ORDER SCHEDULING SYSTEM FOR SERVICES AND EMPLOYEES**

**USERS MANUAL:**

**ACKNOWLEDGMENTS AND DISCLAIMER:**

**This Database was created by Brian Burton, Delana Holden, and Justin Winchester, for Cameron University through the Spring, 2021 Semester, Cameron University Computing and Technology Database Class under the direction of Mr. David Smith. All rights are reserved.**

**It was developed with thoughtful comments and suggestions from Mr. David Smith. This Database is accepted "AS-IS". There is no maintenance agreement between Cameron University and Lawton Public Schools. Use at your own risk. All Company Logos used for presentation in this database are strictly for academic presentation purposes and in no means represent the official brand or company representation of any existing company, business, or subsidiary of such. ALL RIGHTS ARE RESERVED 2021.**

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**USER MANUAL INTRODUCTION**

**This project’s design goal was to implement a functional commercial system that could adhere to the requirements of a landscaping and lawncare company. This system is designed to store data on the companies’ employees, as well as their general business features such as maintaining data about the available or prior services. My team consisting of Brian Burton, Delana Holden, and myself of course Justin Winchester constructed this system using relational database management system tools and languages such as Microsoft Access and MySQL. The system is designed to handle general business needs such as calculated employee work hours on their respective jobs or schedule a service on a work order for a particular property that request on of Lawn Care Plus’s awesome services’.**

* 1. **Download Database program with .accdb extension to your memory device and run with the Microsoft access program.**
  2. **Once program is open a splash screen set to an automatic timer of 1 minute and 15 seconds will appear will project acknowledgements and disclaimer. (This action can be adjusted in the project’s setting under the file tab and selecting project options.**
  3. **A person wearing a hat

     Description automatically generated with medium confidence**

**1.4**

**Splash screen will automatically disappear, and its aesthetic preferences can also be adjusted by right clicking the term splash screen from the left navigation panel and selecting open in design view.**

* 1. **Once the splash screen acknowledgements have been presented the system is set to open the system switchboard for instant user navigation to important executive reports and form entry/viewing areas.**
  2. **Graphical user interface, website

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  3. **The information stored in the switchboard area is for a user to be able it with minimal difficulty allowing them to find and edit important information or data.**
  4. **The switchboard has three main components, one option allows access to the property owners customer list for quick access and lookup, the second option allows the user to access the services tab.**
  5. **and it related form entry /viewing options, and the third access option allows the user to access reports for equipment and other company resources, the reports for the Employee, Equipment, and Property Owner have dynamic functionality and can generate reports based on the identification number of the desired entity. Graphical user interface

     Description automatically generated with medium confidence**
  6. **The Property Owner Selection**
  7. **Graphical user interface

     Description automatically generated**
  8. **The property owners form is open by selecting Property Owner button from the Main Switchboard. This form is a general entry form for entering, editing, or deleting data for the Property Owners. This information is stored in the Property\_Owners table of the Lawn Care Plus database.**
  9. **The Maintain Data Selection:**
  10. **Graphical user interface, text

      Description automatically generated**
  11. **Once this selection has been chosen and a user clicks the Maintain Data button, they are navigated to another selection screen that allows users make different selections for immediate interaction with the company’s database information.**
  12. **A screenshot of a computer

      Description automatically generated with medium confidence**
  13. **Text

      Description automatically generated with medium confidence**
  14. **The Edit Services Button-once clicked this button will open the Services form.**
  15. **Services Form:**
  16. **A screenshot of a computer

      Description automatically generated with medium confidence**
  17. **This form contains the Lawn Care Plus company’s Services management form. Once the form is opened it will display the first service entry in the company’s database and its associated data table information. Using the navigation located at the bottom of the form allows the user to view every Service record in the database. Navigating with the bottom pane past the last record show will show a blank entry form that a user can use to store a new Company Service. In this case this form SID or service identification number is auto generated value that automatically is updated by Microsoft Access, form also request/allows for the entry of the ServiceRatePerAcre which is a value of the Service’s charge rate per acre of customer property. The ServiceDescription is next in the entry form and allows a user to enter a description of that particular service, next the ServiceEstLength, allows for entry of the services estimated job time, and the ServiceTitle stores the name of that particular service.**
  18. **Text

      Description automatically generated**
  19. **The Edit Property Owners Button-**
  20. **Once clicked this button will open the Property Owner General Entry form.**
  21. **Graphical user interface, application

      Description automatically generated**
  22. **This general Property Owner Entry form can be used to view all the stored Property Owner records in the database, or to edit, add, or delete them.**
  23. **The POID- This field store the Property Owners Identification Number**
  24. **The POFName – This field stores the Property Owner’s first name.**
  25. **The POLName- This field stores the Property Owner’s last name.**
  26. **The POPhone – This field stores the Property Owner’s phone number.**
  27. **The POBilling/Address – This field stores the Property Owner’s billing address.**
  28. **The POEmail – This field stores the Property Owner’s email.**
  29. **Graphical user interface, text

      Description automatically generatedThe Edit Service Work Order Navigates to a form that allows for recording of Lawn Care Plus service and its associated Work Order Identification Number.**
  30. **WOID- This field records the Work Order Identification number.**
  31. **This field records the Service Identification Number.**
  32. **This field stores the property’s size in acreage.**
  33. **A picture containing shape

      Description automatically generated**
  34. **The Back To MAIN button takes the user back to the main switchboard menu interface, and ends the selection options.**
  35. **The switchboard contains another navigational component separate from its storage and navigation system that allows the user to access system information in a more detailed and user-friendly manner.**
  36. **Accessing the Main Menu from the Switchboard user access area.**
  37. **Select the Main Menu Button Access option from the bottom footer panel of the Main Switchboard navigation pane.**
  38. **The MAIN MENU**
  39. **The main menu has Main navigational access to the core components of the Lawn Care Plus business system.**
  40. **A screenshot of a computer

      Description automatically generated with low confidence**
  41. **If the user selects the welcome message a dynamic user message is generated in the message box area that can be adjusted to display any company or business information that the administrator would like for users to see when initially accessing the system.**
  42. **There are four main navigation components of the Main Menu Navigation. These main components will be mentioned here and then described in more detail for explaining user interaction with the subcomponents of these forms/reports.**
  43. **The Employees Access area**
  44. ****
  45. **The selection of the Employees button from the Main Menu navigates the user to the Employees Main Form, which has important Employee data user functionality allow for adding Employee information, editing it, deleting it, or viewing it in a meaningful or calculated manner.**
  46. **The Property Owners**
  47. ****
  48. **The selection of the Property Owners navigation button from the Main Menu opens the Property Owners form, who are customers or potential customers of the Lawn Care Plus company that request its amazing services. This form is the general entry form for all Property Owners and has basic functionality as it lists each Property Owner and their associated information.**
  49. **Property Owners Customers button-**
  50. ** This button opens a user-friendly designed form for managing the Property Owner’s information.**
  51. **The property Owners Customer List button-**
  52. ** This opens a form that contains a continuous list of the Property Owners stored in the database.**
  53. **The Equipment –**
  54. ****
  55. **The selection of the Open Equipment button navigates the user to the equipment page that has been formatted for managing the company equipment.**
  56. ****
  57. **This button opens the Time Clock Entry Form, for recording time spent on jobs by employees with their associated Work Orders and company Services.**
  58. **Graphical user interface, application

      Description automatically generated**
  59. **The Work Order Time Clock Entry Form-**
  60. **TimeEntryID- This field associates and stores the time entry identification number.**
  61. **WOID – This field stores the work order identification number.**
  62. **StartTime- This field stores the start time of associated Time Entry which is the start time of job for an associated work order.**
  63. **EndTime- This field stores the ending time of a job for a work order for the associated time entry.**
  64. **A blue screen with white text

      Description automatically generated with low confidence**
  65. **This button opens the Work Order Time Calculation form that show is the identification number of a work order and it associated total hour calculation.**
  66. **Graphical user interface, application

      Description automatically generated**
  67. **This form is based on the **
  68. **Table

      Description automatically generated**
  69. **WorkOrderHourTotalQ – which is a query that calculated the total hours for an individual Work Order based on its time entries in the Time Clock Entry table**
  70. **WOID- Stores the associates Work Order Identification number.**
  71. **Total Hours- Stores the total hours for a work order.**
  72. **A blue screen with white text

      Description automatically generated with low confidence**
  73. **Graphical user interface

      Description automatically generated**
  74. **This form displays the results of the Work Order Hour Total Query in an interactive form that display’s the results of the necessary calculations needed for Lawn Care Plus to record the time spent by its employees on a particular work order and how long it took to complete a particular service.**
  75. **The Work Order calculations are formatted for user interaction in this form that is opened by clicking the Work Order Timetable Button from the main menu.**
  76. **Employee Functionality –**
  77. **Graphical user interface

      Description automatically generated**
  78. **EID- This field store the associated Employee Identification number with the employee, this field is auto generated by the system producing a unique value for each entry.**
  79. **EmployeeSkillLevel- This field stores the employee skill level identification number.**
  80. **EmployeeFName- This field stores the employee first name.**
  81. **EmployeeLName- This field stores the employee’s last name.**
  82. **EmpEmail- This field stores the employee email address.**
  83. **EmpPayRate- This field stores the employee rate of pay.**
  84. **Employee Total Hours- This field outputs the employee’s total hours worked; a value that is store in the Employee Workforce table.**
  85. **Pay Rate- This field outputs the employee pay rate and uses it in the calculation of their pay multiplied by the number of hours worked.**
  86. **Extended Work Pay- This is the value of the employees pay for the number of hours they worked and their rate of pay.**
  87. **Employee Work Force Hours-**
  88. **Graphical user interface, timeline

      Description automatically generated**
  89. **This form is an interactive form that is formatted for the user to manage Employee data, with this form the employee is associated with data stored in other tables in the database that contained important information regarding all entities involved, by using these relationships the user can generate accurate information regarding the employee for company executive management purposes.**
  90. **This form combines forms mentioned earlier in the manual and gives the user instant access to the functionality of each allowing them to accomplish multiple tasks within one area.**
  91. **The Employee Work Force Form Allow for:**
  92. **Updating employee personal information.**
  93. **Updating the total hours worked for the employee based upon the value of the total hours worked for a work order from the work orders total hours worked value.**
  94. **The calculation of the employee’s work hours on individual job segments and the total of all job’s hours for a work order.**
  95. **The user may also generate a dynamic report of the employee earnings based upon the employee record they are viewing.**
  96. **Graphical user interface, text, application, chat or text message

      Description automatically generated**
  97. **This Earnings Report Button –**
  98. **Selection of this button generates a dynamic report of the calculated earning for any employee.**
  99. **Graphical user interface, application, Word

      Description automatically generated**
  100. **PROPERTY OWNERS**
  101. **The Property Owners Customer Form Button –**
  102. ****
  103. **Graphical user interface

       Description automatically generatedThe property owners customer form as aforementioned is a user access area that allows for dynamic management of all Property Owner Customer information.**
  104. **This form is formatted for specific Property Owner activities and integrates the functionality of separate forms with the one Property Owners Customer Form allowing the user to update multiple tables in one area and select or access appropriate Property Owner functions without have to access several different forms.**
  105. **The Property Owners Customer Form Functionality-**
  106. **This forms allows the user to update the Property Owner information presented earlier in the manual, in the upper left corner of the form the personal information for each customer/Property Owner is displayed and available for editing or general user interaction. The other form displayed on the Property Owners Customer Form is the form the contact form/table, and stores information on the associated Property Owners contact history with Lawn Care Plus associates. The user have the ability to store notes, dates, times, and follow up information about the contact.**
  107. **The Work Order Button**
  108. **Graphical user interface, text, application, chat or text message

       Description automatically generated**
  109. **Selection of the Work Order Button-**
  110. **Selecting the Work Order button opens the Work Order Form.**
  111. **Timeline

       Description automatically generated**
  112. **Timeline

       Description automatically generated**
  113. **The Work Order Form-**
  114. **This form display information about the work orders that are stored in the company database. The work order form allows for entry/editing of Work order data, service data, and property data. The Work Order Form associates the appropriate related entities and their respective forms in order to allow the user to have a complete functional form for entering/updating all necessary work order information.**
  115. **The Work Order Form for Property Owners-**
  116. **The work order form was included in the property orders forms and the next level of navigation for the user as the company’s Property Owners are its customer and will be the primary reason of the work order.**
  117. **Using the form from the Property Owner Customer Form allows for dynamism, the user can view the property, its owner, the associated service for the property, and the cost.**
  118. **Selecting the Invoice Button –**
  119. **A picture containing waterfall chart

       Description automatically generated**
  120. **When selection of the invoice button occurs, it uses a query on the work order information to associate it with the property owner who placed a request or order for the service and allow the user of the system to generate a dynamic invoice of services for that customer/ property owner.**
  121. **Graphical user interface, application, Word

       Description automatically generated**
  122. **The customer/Property Owner invoice includes the property owner’s billing address, the serviced property’s address, the price and name of the service, and the Work Order Description.**
  123. **Equipment Functionality-**
  124. ****
  125. **Selection of the Open Equipment Button-**
  126. **Selecting the Open Equipment Button opens the Equipment Form.**
  127. **Graphical user interface

       Description automatically generated**
  128. **The Equipment FORM-**
  129. **The equipment form-**
  130. **EQID- This number is automatically generated and is the associated equipment’s unique identification number.**
  131. **EquipmentRate- this field stores the equipment’s rate of use per acre.**
  132. **EquipmentUseDescription- This field stores a brief relevant description of the company equipment item.**
  133. **EquipName- This field store the title of the equipment item.**
  134. **The second part of the employee form integrates another form The Equipment Work Force FORM.**
  135. **The equipment Work Force Form uses the Equipment Work Force Form as its data source and a combination with a query that calculates the company’s equipment expenses, by the equipment’s rate of use per acre and the work order total hours for an associated work order that company equipment was used on.**
  136. **Graphical user interface

       Description automatically generated with medium confidence**
  137. **Graphical user interface, application, table, Word

       Description automatically generated**
  138. **The is how the system relates the necessary table for easier data management for the user.**
  139. **The Equipment Work Order Button-**
  140. **Graphical user interface, text, chat or text message

       Description automatically generated**
  141. **Graphical user interface, website

       Description automatically generated**
  142. **The Equipment Work Order Button navigates the user to the Equipment\_WorkOrders Form.**
  143. **EQWFID- This number represent the associated equipment with its equipment work force identification number from the table that stores the data for an equipment and the work order it is used in.**
  144. **EQID- The equipment identification number.**
  145. **EquipWorkForceHours- This field stores the number of hours a piece of equipment was used for during a work order.**
  146. **WOID- This is the work order identification number for the work order the equipment was for.**
  147. **The Equipment Expense Report Button-**
  148. **The Equipment Expense Report button open the Equipment Expense Report. This report is dynamically generated for the equipment that the user is viewing or managing data for. The report calculates the total amount of hours a piece of equipment has been used for in total on all recorded jobs and then uses that value with the price of equipment use per acre to get a total of expenses for that equipment.**
  149. **Graphical user interface, application

       Description automatically generated**
  150. **Graphical user interface, application

       Description automatically generated**
  151. **This report includes the equipment’s description, name, the work order identification number, the property identification number, and the work order date it was used for.**

**This completes the general functionality of the LAWN CARE PLUS SYSTEM.**

**That is the completed tutorial of the Lawn Care Plus Company Management System. Thank you for your time and for using this system, we hope the information provided is accurate and helping in assisting you in using the system. Enjoy!**

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