## Omaha Steaks Catering Division

"Omaha Steaks manufactures, markets and distributes a wide variety of premium steaks, red meats and other gourmet foods. These products are custom cut and packaged to serve the needs of our various markets. We are a family business and have been since our founding in 1917." For more information visit www.omahasteaks.com.

This year, Omaha Steaks has partnered with the MWC3 in a pilot project to investigate using the new Omaha Steaks Catering Services for the Saturday night banquet by using this year's attendance data. The Conference Committee has asked you to finish preparing the database of attendee information, the spreadsheet for analyzing the data after the banquet, the presentation to be given at the conference wrap-up, and the formal proposal for the 2024 Conference Committee, a copy of which is to be forwarded to Omaha Steaks.

Since final registration for the banquet starts in the morning (Saturday), time is of the essence - you have until 11:30am this morning to finish your preparations, including using estimated data for the database and spreadsheet. Prepare all deliverables as if the data is final - updates will be made after the banquet, so make sure that all data is linked and can be updated automatically.

Please make sure that you submit ALL of the following files, otherwise the committee will NOT evaluate your work. The deliverables are:

1. TeamNumber_OSCDBanquet.accdb
2. TeamNumber_Menu_Information_and_Nutrition.rtf
3. TeamNumber_Menu_Nutrition.rtf
4. TeamNumber_OSCDDataAnalysis.xlsx
5. TeamNumber_OSCDPresentation.pptx
6. TeamNumber_OSCDProposal.docx
7. TeamNumber_OSCDPresHandout.pdf

## Creating the Database

(Remember to close/save anything you create before going to the next step, unless otherwise instructed.)

1. Rename the Access Database TeamNumber_OSCDBanquet.accdb by adding your actual team number in place of "team number", then open the database.
2. Import Institutions.xlsx - do not allow duplicates in the first column and specify ID as the index, then accept the rest of the defaults.
3. Import Registrants.xlsx - Allow Access to create an ID field that is AutoNumber and accept the rest of the default field names/types. Move the Zip_Code field down after the State field.
4. Change the field names, types/sizes in the Registrants table to match the following:

| Field Name | Type | Size |
| :--- | :--- | :--- |
| First_Name | Short Text | 10 |
| Last_Name | Short Text | 15 |
| Address | Short Text | 30 |
| City | Short Text | 20 |
| State | Short Text | 2 |
| Zip_Code | Short Text | 5 |
| Institution_ID | Number | Double |
| Confirmed | Yes/No |  |
| Menu_ID | Short Text | 10 |

5. Your first task is to finish normalizing the data in the Entrée table. This is accomplished by making separate tables of the redundant and unrelated data. The following tables have already been completed: Appetizers, Pasta_and_Soups, Vegetables, and Sauces. Use the Make Table Query to create the Desserts table. [Hint: Create a query in design view, add the Entrée table, double-click the asterisk, and then drag the ID field to the second column in the query grid. Deselect the checkbox and use this field to search for the first four letters of the dessert items.] Immediately after using the Make Table Query, run the Delete Table query to delete the records from the Entrée Table that were just put in the new table. Close and do not save the query when you are finished.
6. Make ID the Primary Key for the new Dessert table - set it as Short Text with length 10.
7. Create a Menu table with and an ID field and foreign keys (foreign keys are named by using the format tablename_fieldname) to all of the tables listed (see the fields in step 10 below). Make ID the Primary Key for this new table - set it as Short Text with length 10.
8. For each field in the Menu table, create a lookup to display the actual name of the item.

Hint: To create a lookup and have the value you want to see be something other than the index value:

- Select the field from design view
- Click on the Lookup tab under field properties
- Change Display Control to Combo Box
- Row Source Type to Table/Query
- Row Source - pick the name of the table from the drop-down list
- Bound Column is 1
- Column Count is 2
- Column Widths: 0",2"

9. Import the Menu.xml file into the Menu by appending the data. If necessary, sort ID A-Z, then select the Dessert choice for each item from the Drop-down list based on the table below afterwards, check that all of the data in the menu table now matches the table. Finally, make ID the Primary Key.

| ID | Appetizers_ID | Entrees_ID | Sauces_ID | Pasta_and_Soups_ID | Vegetables_ID | Desserts_ID |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Beef | Beef Jerky <br> Original Flavor | Beef Stroganoff <br> w/Noodles | Beef Gravy, <br> Classic | Maine Lobster Ravioli w/ <br> White Wine Butter Sauce | Carrots, Glazed | Cookie Dough, Milk <br> Chocolate <br> Macadamia Nut |
| Chicken | Chicken <br> Cordon Bleu <br> Bites | Chicken Breast, <br> BBQ Rubbed | Seasoned <br> Butter Sauce | Chicken Fettuccine <br> Alfredo | Mixed <br> Vegetables | Cheesecake, New <br> York Individual |
| Seafood | Shrimp, Wild <br> White | Tilapia Fillets, Fire <br> Roasted Lemon <br> Garlic | Lemon Parsley <br> Butter Sauce | Maine Lobster Ravioli w/ <br> White Wine Butter Sauce | Green Beans, <br> Whole | Key Lime Tartlets |
| Vegetarian | Antipasto Bread | Coconut Shrimp |  <br> Tangy <br> Cocktail <br> Sauce | Roasted Vegetable <br> Lasagna | Vegetable <br> Medley, Roasted | Chocolate Molten <br> Lava Cake |

10. Modify the Registrants Table by changing the display of the Institution and Menu field to a Lookup by using the same procedure as step 7 above, except the Menu_ID field will have a Column Count of 1 and no column width specified. Change the display control to a checkbox for the confirmed field. The name of the institution and name of the menu type should appear in datasheet view and be selectable by a drop-down menu.
11. Using the Relationships tool, create one-many relationships [enforce referential integrity and click all three check boxes] between the tables as shown below:

12. Create a Query called Menu_Information_and_Nutrition to calculate costs, calories, and carbs. Use the ID field from the Menu table and the Name field from each of the menu item tables created in Step 7 above, followed by three calculated fields for Meal_Costs, Meal_Calories, and Meal_Carbs. [Hint: Use Builder to create your formulas]. Run the query and then resize all the fields in datasheet view to show all the data.
13. Create a Query to show actual Attendee_Meals_by_Institution using ALL of the fields from the Registrants table (EXCEPT the ID, Institution_ID, and the Menu_ID field), the Institution_Name and Institution_State fields from the Institution table, the ID from the Menu table, and the Meal_Cost
field from the Menu_Information_and_Nutrition query created in the previous step. Include only confirmed registrants.
14. Create an Institutions Form with a Registrants sub-form so that you can add/edit Registrants by Institution. Include all fields from both tables EXCEPT the Institution_ID from the Registrants table. In Layout View, move the window for the subform down and to the left under the control for the subform. In Design View, widen the form and then widen the sub-form window to display all of the data in a row at one time without scrolling. [Hint: Close the property sheet to give you more room on the screen - you will have to go back and forth between form view and design view to check your adjustments.]
15. Create a report titled Attendee_Meals_by_Institution based on the query in Step 13 and group by Institution with cost sub-totals using the Report Wizard. Include the following fields in this order: Institution_Name, First_Name, Last_Name, Meal_Cost. Modify the Institution Name Footer section of the report by deleting the line that begins = "Summary for," change the label "Sum" to "SubTotal" and change the format of both Sum fields to Currency. Change the Name field label to "Institution." Note: Remove underscores in report headings that contain field titles/names on all reports and resize all controls so that titles and data are visible and not truncated.
16. Create a Menu_Information_and_Nutrition Report (using the appropriate query). The report title and the first record are below - manually arrange the fields so that each of the four records looks like this:
Menu Information and Nutrition

17. Create an abbreviated Menu_Nutrition Report (using the appropriate query) with only the ID, cost, calories and carbs.
18. Export the Menu_Nutrition and Menu_Information_and_Nutrition reports as an RTF files for later import into MS Word and PowerPoint and name them TeamNumber_Menu_Nutrition.rtf and TeamNumber_Menu_Information_and_Nutrition.rtf, respectively. Ignore any errors relating to margin or page size.
19. Create a Switchboard to facilitate usage of your form and three reports. Include an Exit button on the Switchboard. [Hint: Since Microsoft has hidden the command to create Switchboard in Access, use your favorite search engine to find information on how to do this in your version of Access.]
20. Close the database.

## Creating the Spreadsheet

Open TeamNumber_OSCDDataAnalysis.xlsx. Note: Remember to use the best possible formatting throughout this process, and always use cell references when available. Your formulas can vary, but higher scores will be earned by using the most efficient formulas and functions to solve the problems.

1. Import the Attendee_Meals_by_Institution query you created in the Access database into the Meals worksheet (beginning in Cell A1), then convert the table to a range. Save the workbook as
TeamNumber_OSCDDataAnalysis.xlsx (replacing "Team Number" with your team number).
2. Import the Registrants table into the Registrants worksheet (beginning in cell A1), then convert the table to a range.
3. Import the Institutions table into the Institutions worksheet (beginning in cell A1), then convert the table to a range. Remove all formatting from the data except the header row.
4. Create three new columns on the Institutions worksheet named "\# Registered", "\# Attended", and "\% Attended" (these should be columns I, J, and K).
5. In the \# Registered column, develop a formula to calculate the total number of students that were registered to attend NCC from each institution.
6. In the \# Attended column, develop a formula to calculate the total number of students that actually attended NCC from each institution. Sort the data by institution name in descending order. (Note: the meals table includes the people who actually attended.)
7. In the $\%$ Attended column, develop a formula to calculate percentage of those who attended compared to those who registered by institution.
8. Create a new worksheet named AP\% Chart. This worksheet should contain a 2D Bar Chart which shows the attendance percentage by institution name. Include data labels and remove the X-Axis from the chart as it is not necessary due to showing the data labels. The graph should be sorted AZ/Top to bottom by Institution Name.
9. On the Institutions worksheet, create a new column (which should be column L) named "Total Meal Cost" and format the column as currency.
10. In the Total Meal Cost column, develop a formula to calculate the Total Meal Cost by institution based on the costs in the meals worksheet. Named Ranges must be created and utilized within this formula.
11. Include a Grand Total in Cell L36 of the Institutions worksheet that displays the total meal cost for all institutions.
12. In the worksheet named Menu Options, create a new field/cell label on the worksheet named "Interest Rate" (Cell A14). Enter the annual interest rate of $4.0 \%$ to the right of the label (Cell B14). Create a named range for the entered interest rate called "interest".
13. Create a new field/cell label on the Menu Options worksheet below the interest rate named "Periods/Yr" (Cell A15). Enter the number of periods per year as 4 in cell B15. Create a named range for the entered periods per year called "periods."
14. Omaha Steaks will allow AITP to finance the cost of the meals over a one year (four quarter) period, Create a new field/cell label on the Menu Options worksheet named Payment (Cell A16). Develop a formula in cell B16 that will show the quarterly payment amount based on the Grand Total from the Institutions worksheet. Use the periods/yr and interest rate entered by using the named ranges created in the previous steps. Note: the payment amount should display as a positive value.
15. Create a new field/cell label on the Menu Options worksheet named Total Payments (Cell A17). Develop a formula in cell B17 that will show the grand total of payments that will be received by Omaha Steaks over one year and remember to make sure to use the named ranges created in the previous steps. [Hint: named ranges can and should be used in formulas whenever possible.]
16. Create a new field/cell label on the Menu Options worksheet below the Total Payments named Interest Paid (Cell A18). Develop a formula in cell B18 that will show how much money Omaha Steaks earned by financing the total meal cost for AITP.
17. Use Goal Seek to determine what interest rate Omaha Steaks would need to charge to potentially earn $\$ 500$ from the financing. Please leave the new percentage rate in the interest rate field and do not change it back to the original percentage rate.
18. Create a Filter on the Institutions worksheet schools that have less than $100 \%$ attendance. Note: This will likely change the resulting output and charts created in previous steps.
19. Create the following labels on the Menu Options worksheet in cells A1:A6. "Menu Option" (Cell A1), "Beef" (Cell A2), "Chicken" (Cell A3), "Seafood" (Cell A4), "Vegetarian" (Cell A5), and "Total Meals" (Cell A6). Create appropriate column labels in Cells B1:G1, the create formulas in cells B2:G6 that calculate the total number of attendees that chose that option (Column B). Create a formula that will calculate the percent total of meals by menu option, use an absolute reference and the sum function to determine the divisor in the percent total formula (Column C). Create a formula that will calculate the total meal cost by meal type (Column D). Create a formula that will calculate the Tax (Column E), Gratuity (Column F), and Total (Column G); For tax and gratuity, create named ranges and use the values in the assumptions section of the Menu Options worksheet. Additionally, create formulas to show the total number of meals, cost, tax, gratuity, and grand total in Row 6.
20. Create a 3-D Pie chart displaying the breakdown of total meals by menu option and include the chart on the Menu Options worksheet. Display the menu option on the wedge as a data label (do not include \# of meals in the data label). If necessary, rotate the chart so that Vegetarian is centered in the front and Chicken is in the back. Size all labels so that each one fits in its respective slice. Add an appropriate title to the chart.
21. Create a new Pivot Table on a new worksheet named State Statistics based off the Registrants worksheet. Display the State and the total number of attendees who registered, but did not attend AND those who registered and did attend from those states. Make sure to change column/row headings to appropriate labels. State abbreviations should be sorted alphabetically. *Note: The Confirmed Column on the Registrants worksheet indicates whether or not the registrant attended, True if they did attend, False if they did not. Examples of the top and bottom rows of the table are provided below.


## 22. Create a new Pivot Chart on a new worksheet named State Statistics Chart based on the State Statistics Pivot Table that shows the state abbreviate and the \# attended from each state. Give the chart an appropriate title and remove the legend.

## Create the Business Proposal

Your team is to update a document that will be used by Omaha Steaks to convince the MWC3 to use their food and catering services at the awards banquet on Saturday night. The basic information and sections are in the file CateringProposal.txt. Open this file and save as TeamNumber__OSCDProposal.docx.

1. Create a cover page:

- Display your team name (use the format Team \#[TeamNumber]) on the front page of your report. DO NOT type the names of the team members or your school.
- Include the text "Feasibility Study for Omaha Steaks Catering Division" on the title page.
- Add/remove other title page fields as appropriate.

2. Insert the graphic named omahasteakslogo.jpg on the first page of the report. You can find the graphic in the folder with other files for this competition. Change the format to square and display the graphic on the right side of the Executive Summary paragraph.
3. Change the font of the text used in the body of the document as you see fit. Modify the format of all paragraph headings to use Heading 1.
4. Below the Description of Products and Services paragraph, insert OmahaSteaks1.jpg.

- Crop the image so only the large picture displays in the document.
- Reduce the size of the image to 1.5 " $\times 2$ ".

5. Below the second paragraph of the in the Why Use Omaha Steaks Catering? section, display the Menu Information and Nutrition information from the RTF file you created from the Access report of the same name.

- Remove any portions of the column descriptions that are not necessary.
- Adjust sizing of column descriptions to prevent wrapping.
- Add a border to this information.
- Insert a caption using the Caption tool. Display the caption below the table.

6. Below the Menu Information and Nutrition information you just imported, insert this table:

| Competitors | Top Entrée | Price | Calories |
| :--- | :--- | :---: | :---: |
| Omaha Steaks | Filet Mignons (4 oz.) | $\$ 16.50$ | 492 |
| Ozark Smoked Meat Company | Pork sandwich platter <br> (with side and drink) | $\$ 9.69$ | 850 |
| Anthony's Steakhouse | Prime Rib (14 oz.) | $\$ 32.95$ | 1055 |
| Nebraska Famous Steaks | Ribeye | $\$ 23.24$ | 762 |

- Change the design to use a Grid Table style.
- Center the information in the Price and Calories columns.
- Autofit the contents of the table.
- Insert a caption for the table using the Caption tool. Display the caption below the table.

7. Below the first paragraph in the Serving Your Delegation paragraph, insert and link the pie chart created in the Menu Options sheet of the TeamNumber_OSCDDataAnalysis.xlsx file you saved. Insert a caption for the chart using the Caption tool. Display the caption below the chart.
8. Under the last paragraph in the Financial Considerations paragraph, create the following table and enter the data as shown - double check the data with the Excel Menu Options worksheet. [Note: importing from Excel would include more data than needed for this project]

| Food | $\$ 18185.90$ |
| :--- | :--- |
| Gratuity | $\$ 4000.90$ |
| Tax | $\$ 1000.22$ |
| Total Cost |  |

- Change the design to use a Grid Table style, consistent with the style used before.
- Use a formula to calculate the total cost in the last cell of the table.
- Insert a caption for the table using the Caption tool. Display the caption below the table.
- In the Serve Omaha Steaks at MWC3 section, format the reasons why Omaha Steaks is the best option for NCC as a bulleted list.

9. Insert page numbers that display on the bottom right side of each page, except the title page. [Note: The footer on the page following the title page should display as page number one.]
10. Insert an auto-generated Table of Contents that displays between the title page and the first page of the report.
11. Insert an auto-generated Table of Figures that displays on the same page as the Table of Contents. The Table of Figures should only display entries for tables and should have an appropriate header (similar to the Table of Contents).
12. Save the document.

## Create the Presentation (no starter file)

One additional task that you have at hand is to present a summary of the Catering Proposal to the NCC Board of Directors. Your presentation must include information about the proposal from Omaha Steaks, outlining why a dinner serving food from Omaha Steaks will be preferred by the participants. Supplement your position by using tables and charts that you created in your spreadsheet.

As you create the presentation using PowerPoint, adhere to the following guidelines:

1. The presentation should use exactly six (6) slides. Use colors, graphics, and styles consistent with other documents used in this project. Apply transitions to all slides.
2. Remember to adhere to the Rule of Sixes: No more than six words per line, six lines per slide.
3. Insert a footer with page number and date (the date should not auto update), and the footer should not display on the first slide.
4. The first slide must be a title slide, which contains contact information for the presenters (Your team number) and the MWC3 logo (mwc3.png)
5. The second and third slides must contain information about Omaha Steaks®, including their logo (omahasteakslogo.jpg). Create a hyperlink to the Omaha Steaks website using the logo. (Note: you select the information to include)
6. The fourth slide must contain table data, linked to the data you generate in Excel, showing the cost of the award banquet for each school that is participating.
7. The fifth slide must contain the 3D Chart, linked to the chart you created in Excel, showing the portion of attendees who chose each menu option.
8. The sixth slide must contain a table that uses the abbreviated information you generated in the Access database showing the individual items that constitute each menu option. You saved this information in a file named TeamNumber_Menu_Nutrition.rtf
9. Save your presentation as TeamNumber_OSCDPresentation.pptx
10. Create a PDF document that displays slide handouts, showing six slides per page, and save it as TeamNumber_OSCDPresHandout.pdf

At this time, return to Page 1 of this instruction booklet and make sure you have all the documents listed as deliverables on that page.

