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| Gore Range Carpet Cleaning is a family-owned business in Eagle-Vail, Colorado. For its services, the company has always charged a flat fee per hundred square feet of carpet cleaned. The current fee is $22.55 per hundred square feet. However, there is some question about whether the company is actually making any money on jobs for some customers—particularly those located on more remote ranches that require considerable travel time. The owner’s daughter, home for the summer from college, has suggested investigating this question using activity-based costing. After some discussion, a simple system consisting of four activity cost pools seemed to be adequate. The activity cost pools and their activity measures appear below: |

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|   Activity Cost Pool                | Activity Measure     | Activity for the Year        |
|   Cleaning carpets | Square feet cleaned (00s) | 10,000 |  hundred square feet   |
|   Travel to jobs | Miles driven | 359,000 |  miles |
|   Job support | Number of jobs  | 1,700 |  jobs |
|   Other (organization-sustaining    and idle capacity costs) | None |  Not applicable |
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|      The total cost of operating the company for the year is $335,000, which includes the following costs: |

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|   |   |   |
|   Wages | $ | 137,000    |
|   Cleaning supplies |   | 21,000    |
|   Cleaning equipment depreciation |   | 7,000    |
|   Vehicle expenses |   | 30,000    |
|   Office expenses |   | 70,000    |
|   President’s compensation |   | 70,000    |
|   |  |  |
|   Total cost | $ | 335,000    |
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|      Resource consumption is distributed across the activities as follows: |

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| --- | --- |
|   | Distribution of Resource Consumption Across Activities   |

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| --- | --- | --- | --- | --- | --- |
|   | Cleaning Carpets | Travel to Jobs | Job Support | Other | Total |
|   Wages | 71 | % | 12 | % | 0 | % | 17 | % | 100 | % |
|   Cleaning supplies | 100 | % | 0 | % | 0 | % |  0 | % | 100 | % |
|   Cleaning equipment depreciation | 70 | % | 0 | % | 0 | % | 30 | % | 100 | % |
|   Vehicle expenses | 0 | % | 84 | % | 0 | % | 16 | % | 100 | % |
|   Office expenses | 0 | % | 0 | % | 60 | % | 40 | % | 100 | % |
|   President’s compensation | 0 | % | 0 | % | 35 | % | 65 | % | 100 | % |
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| Job support consists of receiving calls from potential customers at the home office, scheduling jobs, billing, resolving issues, and so on. |

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| **Required:** |

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| **1.** | Prepare the first-stage allocation of costs to the activity cost pools. **(Leave no cells blank - be certain to enter "0" wherever required. Omit the "$" sign in your response.)** |

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| --- | --- | --- | --- | --- | --- |
|   |          Cleaning         Carpets |          Travel to Jobs |      Job       Support |           Other |         Total |
|   Wages | $   | $   | $   | $   | $   |
|   Cleaning supplies |   |   |   |   |   |
|   Cleaning equipment depreciation |   |   |   |   |   |
|   Vehicle expenses |   |   |   |   |   |
|   Office expenses |   |   |   |   |   |
|   President’s compensation |   |   |   |   |   |
|   |  |  |  |  |  |
|   Total cost | $    | $   | $   | $   | $   |
|   |  |  |  |  |  |
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| **2.** | Compute the activity rates for the activity cost pools. **(Round your answers to 2 decimal places. Omit the "$" sign in your response.)** |

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|   Activity Cost Pool | Activity Rate                                  |
|   Cleaning carpets | $  |  per hundred square feet |
|   Travel to jobs | $  |  per mile |
|   Job support | $  |  per job |
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| --- | --- |
| **3.** | The company recently completed a 4 hundred square-foot carpet-cleaning job at the Lazy Bee Ranch—a 52.00-mile round-trip from the company’s offices in Eagle-Vail. Compute the cost of this job using the activity-based costing system. **(Round your intermediate and final answers to 2 decimal places. Omit the "$" sign in your response.)** |

|  |  |
| --- | --- |
|   Cost |        $   |

|  |  |
| --- | --- |
| **4.** | The revenue from the Lazy Bee Ranch was $90.20 (4 hundred square-feet at $22.55 per hundred square feet). Prepare a report showing the margin from this job. **(Input all amounts as positive values except losses which should be indicated by a minus sign. Round your intermediate and final answers to 2 decimal places. Omit the "$" sign in your response.)** |

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| Gore Range Carpet CleaningCustomer Margin—Activity-Based Costing |
|  Sales    |   | $   |
|   Costs: |   |   |
|          Cleaning carpets | $   |   |
|          Job support |   |   |
|          Travel to jobs |   |   |
|    |  |  |
|   Customer margin |   | $   |
|   |   |  |