## **Project 9... Basically Speaking**

Create a project called *TableOfBases* with class *Tester*. The *main* method should have a *for* loop that cycles through the integer values  $65 \le j \le 90$  (These are the ASCII codes for characters A – Z). Use the methods learned in this lesson to produce a line of this table on each pass through the loop. Display the equivalent of the decimal number in the various bases just learned (binary, octal, and hex) as well as the character itself:

| Decimal | Binary  | Octal | Hex | Character |
|---------|---------|-------|-----|-----------|
| 65      | 1000001 | 101   | 41  | A         |
| 66      | 1000010 | 102   | 42  | В         |
| 67      | 1000011 | 103   | 43  | C         |
| 68      | 1000100 | 104   | 44  | D         |
| 69      | 1000101 | 105   | 45  | E         |
| 70      | 1000110 | 106   | 46  | F         |
| 71      | 1000111 | 107   | 47  | G         |
| 72      | 1001000 | 110   | 48  | H         |
| 73      | 1001001 | 111   | 49  | I         |
| 74      | 1001010 | 112   | 4a  | J         |
| 75      | 1001011 | 113   | 4b  | K         |
| 76      | 1001100 | 114   | 4c  | L         |
| 77      | 1001101 | 115   | 4d  | M         |
| 78      | 1001110 | 116   | 4e  | N         |
| 79      | 1001111 | 117   | 4f  | O         |
| 80      | 1010000 | 120   | 50  | P         |
| 81      | 1010001 | 121   | 51  | Q         |
| 82      | 1010010 | 122   | 52  | R         |
| 83      | 1010011 | 123   | 53  | S         |
| 84      | 1010100 | 124   | 54  | T         |
| 85      | 1010101 | 125   | 55  | U         |
| 86      | 1010110 | 126   | 56  | V         |
| 87      | 1010111 | 127   | 57  | W         |
| 88      | 1011000 | 130   | 58  | X         |
| 89      | 1011001 | 131   | 59  | Y         |
| 90      | 1011010 | 132   | 5a  | Z         |
|         |         |       |     |           |