Index

• Symbols •

& (ampersand), 126
' (apostrophe) in comments, 52–53
" " (double quotation marks), 58, 83, 353
= (equal to) unconditional operator, 66
!= (exclamation point) (bang operator), 80, 155
> greater than unconditional operator, 66
>= greater than or equal to unconditional operator, 66
< less than unconditional operator, 66
<= less than or equal to unconditional operator, 66
<> (not equal to) unconditional operator, 66
() parentheses
functions, 241
syntax, 353
. (period) (dot operator), 79–80
| (pipe), 63, 103
' ' (single quotation marks), 83
[ ] (square brackets), 42, 91, 154–155
_ (underscore) continuation character, 157–158

• A •

ACCDB database file, 295
Access
object library, 32
object model, 74
Access (Microsoft)
Database Splitter, 295–298
Expression Builder, 239–240
help, 354
importance of understanding how it works, 351
Linked Table Manager, 297–298
Navigation pane, 10
object library, 32
object model, 74
uses for, 1
versions, 1, 9
wizards, 15
Access 2007 All-in-One Desk Reference For Dummies (Simpson, Levine Young, and Barrows), 9
Access 2007 For Dummies (Kaufeld, Ulrich Fuller, and Cook), 9
Access 2007 VBA Programming For Dummies Web site, 5
accessing object libraries, 315–317
action queries
defined, 121–123
performing on one record, 136–137
warning messages, 124–125
ActiveX Data Objects (ADO), 141
ActiveX Data Objects 2.8 Library, 32
Add Procedure dialog box, 37, 242
adding
records to a table, 131–134
related record to another table, 109–112
ADODB connection, 140–141
ADODB object library, 32
ADODB recordsets
ADO (ActiveX Data Objects), 141
closing, 146
copying to an Excel worksheet, 342–345
creating, 138–140, 166–167
creating from external tables, 308–309
DAO (Data Access Objects), 141
defined, 137
defining, 141
filling with data, 142–143
navigating, 144–145
opening, 143–144
referring to fields in a recordset, 145–146
syntax, 144
Type property, 167
After Insert (AfterInsert) event, 98
After Update (AfterUpdate) event, 89, 219
AllForms collection, 150
Allow Additions property, 185
Allow Datasheet View property, 185
Allow Deletions property, 185
Allow Edits property, 185
Allow Filters property, 186
Allow Form View property, 185
Allow Layout View property, 185
Allow PivotChart View property, 185
Allow PivotTable View property, 185
ampersand (&), 126
AND logical operator, 67
apostrophe (’) in comments, 52–53
appearance
of message boxes, 177–179
of objects, 99
appending records to a table, 131–134
application modal, 178
Application object, 318
ApplyFilter method (DoCmd object), 112
argument list, 55–57
arguments
custom functions, 242–243
defined, 41–43
help, 43–45
named arguments, 45
syntax, 44–45, 55–56
arrays
creating, 59
defined, 58
elements, 58–60
multidimensional arrays, 59–60
names, 59–60
one-dimensional arrays, 59
subscripts, 58–60
syntax, 59
two-dimensional arrays, 59–60
values, 59
asking users questions, 362–363
assigning values to variables, 57
Automation technology, 29, 315, 317
avoiding retyping common entries, 235–238

**B**

Back Color property, 99, 186
Back Style property, 101
bang (!) operator, 80, 155
Barrows, Alison, Access 2007 All-in-One Desk Reference For Dummies, 9
Beep method (DoCmd object), 112
Before Update (BeforeUpdate) event, 89
blank spaces, 38
boldface, 103
bookmarks in Word templates, 325–327
Boolean data type
defined, 53
naming conventions, 62
Border Color property, 99
Border Style property, 101, 186
breakpoints, 279–281
browsing Access object model, 74
bugs (errors). See also debugging compile errors, 268–274
defined, 265
logical errors, 268, 274–278
runtime errors, 268–269, 283–287
built-in functions. See also functions
Date(), 241
defined, 19, 239–241
Format(), 258
help, 240
Left(), 247
Mid(), 247
MsgBox(), 176–182, 362–363
Nz(), 257
parentheses, 241
Sqr(), 241
StrConv(), 245, 247
UCase(), 247
values, 241
buttons in message boxes, 176–182
Byte data type
  defined, 53
  naming conventions, 62

• C •
calling procedures, 17–18, 171–172
CCSecureQry query, 300–301
Change event, 89
changing
  appearance of objects, 99
  contents of a control, 360
  control types, 204
  linked tables back to local tables, 299
  records (rows), 134–136
  value of a property, 81–82
checks
  check-printing report, 254–255
  printing, 251–255
class modules. See also modules
  defined, 12–13
  forms, 14–15, 87–89
class procedures, 87–89
classes
  Class icon, 78
  Classes list (Object Browser), 31–32
  defined, 76
Click event, 89, 198
client, 295
client-server relationship, 295, 299–302
Close Button property, 186
Close event, 98
Close method (DoCmd object), 131, 364
closing
  database connections, 146
  forms, 107–109
  Object Browser, 33
  recordsets, 146
  tables, 130–131
  Visual Basic Editor, 16–17
code
  breakpoints, 279–281
  bugs (errors), 265
  comments, 52–53
  copying, 5, 46–47
debugging, 265
defined, 11
Fancy SkipLabels Dialog Box
  form, 219
linking to external data through code, 304–305
modifying prewritten code, 48
prewritten code, 46–48, 355
reading, 154
SQL (Structured Query Language), 123–124
square brackets ([ ]), 42, 91, 154–155
stepping through code, 281–282
syntax, 38–45
underscore (_) continuation character, 157–158
uses for, 12
writing, 11–12, 351–356
Code window (Visual Basic Editor), 15, 27–28
collections
  AllForms, 150
  changing value of a property, 81–82
  Class icon, 78
  defined, 72–74
  enumerating, 147–152
  Forms, 150
  getting the value of a property, 79–81
  help, 76–77
  identifiers, 79–81
  looping through, 147–152
  methods, 75–76, 82–84
  properties, 75–76
colors
  constants, 100
  custom colors, 100–101
  defining, 101–103
  dialog boxes, 186
  properties, 99–100, 186
  RGB values, 100–101
  Colors dialog box, 100–101
columns (fields)
  defined, 10
  listing field names in controls, 204–206
  references, 145–146
combining conditional expressions, 67
combo boxes
  avoiding retyping common entries, 235–238
  creating, 189–195, 202–203
  Default Value property, 203
defined, 201
  hidden values, 228–232
  ItemData(x) property, 203
  Limit to List property, 203
  linked lists, 216–218
List Rows property, 203
List Width property, 203
listing field names, 204–206
listing form names, 211–212
listing query names, 208–211
listing report names, 211
listing table names, 208–211
listing table/query field values, 212–215
listing text options, 207–208
Name property, 203
quick find feature, 232–235
Requery method, 223–226
Row Source property, 201, 203, 207
Row Source Type property, 203–208
updating, 219–228, 360–361
  Value List, 207–208
  Value property, 203
comments, 52–53
comparison operators, 66
compilation, 266–268
compile errors
  debuggin, 269–274
defined, 268
  Expected: end of statement, 272
  Expected: expression, 271
  Expected: list separator or ), 272–274
concatenating strings, 126
conditional expressions
  combining, 67
  comparison operators, 66
defined, 66
logical operators, 67
syntax, 66–67
conditions
  If...End If statement, 67–68
  loops, 63–64
connections to databases
  ADODB connection, 140–141
closing, 146
constants
  color constants, 100
  Constant icon, 78
creating, 58
defined, 44, 58
names, 58
syntax, 58
values, 58
continuation character, 157–158
Control Box property, 186
Control Source property, 255
controls
  avoiding retyping common entries, 235–238
  changing contents of a control, 360
  changing control types, 204
colors, 99–103
disabling, 90–94
enabling, 90–94
  events, 89
  filling with data, 105–107
  focus, 91–92
  hiding, 95
list boxes, 201–238, 360–361
listing field names, 204–206
listing form names, 211–212
listing query names, 208–211
listing report names, 211
listing table names, 208–211
listing table/query field values, 212–215
listing text options, 207–208
locking, 96
moving the cursor to a control, 91–92, 359
names, 203
number styles, 103
read-only, 96
showing, 95
special effects, 104
spin box controls, 195–197
text styles, 103
unbound controls, 202
unlocking, 96
Cook, Ken, Access 2007 For Dummies, 9
copying
code from the Web, 46–47
code from the Web site for this book, 5
recordsets to an Excel worksheet, 342–345
CopyObject method (DoCmd object), 113
Count property, 147–148, 152
CREATE TABLE SQL statement, 129–130
creating
arrays, 59
combo boxes, 202–203
constants, 58
dialog boxes, 175
error handlers, 288–292
form letters, 325–331
functions, 241–242
instances, 319–320
linked lists, 216–218
list boxes, 202–203
message boxes, 176–179
modules, 35–36
procedures, 36–38
queries, 117–118
recordsets, 138–140, 166–167
recordsets from external tables, 308–309
standard modules, 35–36
tables, 128–130
variables, 57–58
what-if scenarios, 335–342
Currency data type
defined, 53
naming conventions, 62
Current event, 96–98
cursor positioning, 91–92, 359
custom colors, 100–101
custom functions. See also functions
arguments, 242–243
creating, 241–242
names, 242
NumWord(), 251–263
passing data to a function, 242–243
PCase(), 246–250
returning a value from a function, 243–244
standard modules, 241
testing, 244–245
custom help access, 180
custom messages, 361–362
Cycle property, 186

• D •

DAO (Data Access Objects), 141
DAO object library, 32
Data Entry property, 186
data storage
arrays, 58–60
constants, 57–58
data types, 53–55
dialog box settings, 183–184
SQL statements in variables, 125–127
variables, 57–58
data types
Boolean, 53, 62
Byte, 53, 62
Currency, 53, 62
Date, 53, 62
Decimal, 55
defined, 53
Double, 53, 62
Integer, 54, 62
Long, 54, 62
Object, 54
Single, 54, 62
String, 54, 62
Variant, 54, 62
database connections
ADODB connection, 140–141
closing, 146
Database Splitter (Microsoft Access), 295–298
database tables
adding a related record to another table, 109–112
adding records, 131–134
database tables (continued)
appending records, 131–134
avoiding multiple tables and links, 305–307
closing, 130–131
creating, 128–130
creating recordsets from external tables, 308–309
defined, 10
deleting, 130–131
exporting data, 309–314
importing data, 302–304, 309–314
Linked Table Manager, 297–298
linked tables, 298–299
linking to external data, 304–305, 309–314
listing query names in a control, 208
listing table names in a control, 209–211
listing table/query field values in a control, 212–215
local tables, 298–299
databases
ACCDB database file, 295
avoiding multiple tables and links, 305–307
client-server relationship, 295, 299–302
exporting data, 309–314
importing data, 302–304, 309–314
Linking Table Manager, 297–298
linked tables, 298–299
linking to external data, 304–305, 309–314
listing query names in a control, 208
listing table names in a control, 209–211
listing table/query field values in a control, 212–215
local tables, 298–299
Data data type
defined, 53
naming conventions, 62
Date() function, 241
debug window (Visual Basic Editor), 26
debugging. See also bugs (errors)
breakpoints, 279–281
compile errors, 269–274
defined, 265
error handlers, 285–292
Locals window (VBA Editor), 280–281
logical errors, 274–278
runtime errors, 283–287
stepping through code, 281–282
Debug.Print statement, 275–278
Decimal data type, 55
decision-making constructs
conditional expressions, 66–67
If...End If statement, 67–68
loops, 62–65
Select Case block of code, 68–69
declarations area of modules, 60
declaring
object variables, 319–320
variables, 165
Default Method icon, 78
Default Property icon, 77
Default Value property, 203
Default View property, 185
defining
colors, 101–103
recordsets, 141
Delete event, 98
DeleteObject method (DoCmd object), 113, 131
deleting
records (rows), 134–136
tables, 130–131
delimiters (separators), 79–80
dependencies in linked lists, 217
Destination Table property, 128
Details pane (Object Browser), 31–32
detecting mouse clicks, 198–199
determining whether a form is open or closed, 226, 358
dialog boxes
colors, 186
controls, 187–188
creating, 175
defined, 175
Fancy SkipLabels Dialog Box form, 219
forms, 184–186
message boxes, 176–182
mouse clicks, detecting, 198–199
storing dialog box settings, 183–184
uses for, 182–183
Dim statement, 152–153
disabling controls, 90–94
Dividing Lines property, 186
DoCmd object
  ApplyFilter method, 112
  Beep method, 112
  Close method, 131, 364
  CopyObject method, 113
  DeleteObject method, 113, 131
  FindNext method, 112
  FindRecord method, 112
  GoToControl method, 112
  GoToRecord method, 112, 364
  Object Browser, 113–114, 365
  OpenForm method, 357, 364
  OpenReport method, 364
  OutputTo method, 364
  PrintOut method, 112, 364
  Rename method, 113, 364
  RunCommand method, 113
  RunMacro method, 364
  RunSQL method, 365
  Save method, 112, 365
  SelectObject method, 112, 365
  SendObject method, 113, 365
  ShowAllRecords method, 112
  TransferDatabase method, 302–305
  TransferSpreadsheet method, 365
Do...Loop loops, 62–63
dot (.) operator, 79–80
Double data type
  defined, 53
  naming conventions, 62
double quotation marks (" "), 58, 83, 353
drop-down lists, 189–195

• E •

Editor
  closing, 16–17
  Code window, 15, 27–28
  debug window, 26
  Immediate window, 26–27
  Locals window, 280–281
  moving windows, 281
  opening, 15–16, 21
  panes, 22–23
  Project Explorer, 23–25
  Properties window, 24–25
  sizing windows, 281
  syntax, 38–39
  toolbars, 22
elements in arrays, 58–60
e-mail, sending via Outlook, 320–324
Enabled property, 90–91
enabling controls, 90–94
encapsulation, 217–218
Enum icon, 78
enumerating collections, 147–152
equal to (=) conditional operator, 66
error handlers
  creating, 288–292
  defined, 285
  error description, 285
  error number, 285
  On Error statement, 285–286
  labels, 287–288
  Resume statement, 286
  trapping runtime errors, 285
errors (bugs). See also debugging
  compile errors, 268–274
  defined, 265
  logical errors, 268, 274–278
  runtime errors, 268–269, 283–287
events
  After Insert (AfterInsert), 98
  After Update (AfterUpdate), 89, 219
  Before Update (BeforeUpdate), 89
  calling a procedure from an event, 171–172
controls, 89
Event icon, 78
form events, 96–98
mouse clicks, 198–199
On Change (Change), 89
On Click (Click), 89, 198
On Close (Close), 98
On Current (Current), 96–98
On Delete (Delete), 98
On Load (Load), 98, 218–219, 298
events (continued)
  On Mouse Down (MouseDown), 89,
      198–199
  On Unload (Unload), 298
Excel (Microsoft)
  copying recordsets to an Excel
      worksheet, 342–345
  running Excel macros from Access,
      346–347
  uses for, 334
  what-if scenarios, 334–342
exclamation point (!) (bang operator),
      80, 155
executing
  defined, 12
  procedures, 17–18
Expected: end of statement compile
      error, 272
Expected: expression compile
      error, 271
Expected: list separator or )
      compile error, 272–274
exporting data, 309–314
Expression Builder
  built-in functions, 239–240
  opening, 239–240
expressions
  conditional expressions, 66–67
  testing, 26–27
  uses for, 239

F

Fancy SkipLabels Dialog Box
  form, 219
fields (columns)
  defined, 10
  listing field names in controls, 204–206
  references, 145–146
filling
  form controls with data, 105–107
  recordsets with data, 142–143
FindNext method (DoCmd object), 112
FindRecord method (DoCmd object), 112
focus (controls), 91–92
Font Bold property, 103
Font Italic property, 103
Font Name property, 103
Font Size property, 103
Font Underline property, 103
ForeColor property, 99
form controls
  avoiding retyping common entries,
      235–238
  changing contents of a control, 360
  changing control types, 204
  colors, 99–103
  combo boxes, 189–195, 201–238, 360–361
  disabling, 90–94
  enabling, 90–94
  events, 89
  filling with data, 105–107
  focus, 91–92
  hiding, 95
  list boxes, 201–238, 360–361
  listing field names, 204–206
  listing form names, 211–212
  listing query names, 208–211
  listing report names, 211
  listing table names, 208–211
  listing table/query field values, 212–215
  listing text options, 207–208
  locking, 96
  moving the cursor to a control, 91–92, 359
  names, 203
  number styles, 103
  read-only, 96
  showing, 95
  special effects, 104
  spin box controls, 195–197
  text styles, 103
  unbound controls, 202
  unlocking, 96
form events
  After Insert (AfterInsert), 98
  After Update (AfterUpdate), 219
  defined, 96
  On Close (Close), 98
  On Current (Current), 96–98
  On Delete (Delete), 98
  On Load (Load), 98, 218–219, 298
  On Unload (Unload), 298
form letters
   Access forms, 327-328
   merge code, 328-334
   Microsoft Word templates, 325-327
Format() function, 258
Form_Current() procedure, 97-98
forms
   adding a related record to another table, 109-112
   class modules, 14-15, 87-89
   class procedures, 87-89
   closing, 107-109
   colors, 99-103
   defined, 10
   determining whether a form is open or closed, 226, 358
   dialog boxes, 184-186
   Fancy SkipLabels Dialog Box form, 219
   linking to lists across forms, 222-223
   listing form names in a control, 211-212
   number styles, 103
   opening, 107-109, 357
   properties, 184-186, 358
   references to open forms, 358-359
   SkipLabelsForm form, 159-162
   synchronizing, 227-228
   text styles, 103
   Forms collection, 150
   For...Next loop, 64-65
functions. See also procedures
   arguments, 242-243
   built-in functions, 239-241
   creating, 241-242
   Date(), 241
   defined, 19
   Format(), 258
   help, 240
   Left(), 247
   Mid(), 247
   MsgBox(), 176-182, 362-363
   names, 242
   NumWord(), 251-263
   Nz(), 257
   parentheses, 241
   passing data to a function, 242-243
   PCase(), 246-250
   returning a value from a function, 243-244
   Sqr(), 241
   standard modules, 241
   StrConv(), 245, 278
   testing, 244-245, 278
   UCase(), 247
   values, 241
• G •
   Get External Data dialog box, 47
   getting the value of a property, 79-81
   Global icon, 78
   GoToControl method (DoCmd object), 112
   GoToRecord method (DoCmd object), 112, 364
   greater than (>) conditional operator, 66
   greater than or equal to (>=) conditional operator, 66
   guessing, 354
• H •
   handling errors
   creating error handlers, 288-292
   error description, 285
   error number, 285
   On Error statement, 285-286
   labels, 287-288
   Resume statement, 286
   trapping runtime errors, 285
   help
   arguments, 43, 45
   collections, 76-77
   custom help access, 180
   functions, 240
   Help windows (Object Browser), 33-34
   keywords, 40-43, 154
   methods, 84-85
   Microsoft Access, 354
   objects, 76-77
   properties, 84-85
   syntax, 38-43, 45
   VBA (Visual Basic for Applications), 354
   hidden values in combo and list boxes, 228-232
hiding
  controls, 95
  warning messages, 124–125
high-level programming languages, 266–267

• I •
icons
  Class icon, 78
  Constant icon, 78
  Default Method icon, 78
  Default Property icon, 77
  Enum icon, 78
  Event icon, 78
  Global icon, 78
  Method icon, 78
  Module icon, 78
  Object Library icon, 78
  Project icon, 78
  Property icon, 77
  User Defined Type icon, 78
  VBA Keyword or Data icon, 78
identifiers, 79–81
If...End If statement, 67–68
Immediate window (Visual Basic Editor), 26–27
Import Objects dialog box, 47
importing
  data, 302–304, 309–314
  modules, 47–48
input from users, 362–363
INSERT INTO SQL statement, 132–133
instances, 319–320
Integer data type
  defined, 54
  naming conventions, 62
integration with Office applications
  Application object, 318
  Automation technology, 315, 317
  copying recordsets to an Excel worksheet, 342–345
  form letters with Word, 326–334
  instances, 319–320
  Object Browser, 317–318
  object libraries, 32, 315–317
running Excel macros from Access, 346–347
sending e-mail via Outlook, 320–324
what-if scenarios with Excel, 334–342
IntelliSense technology, 76
IsLoaded property, 358
italics, 103
ItemData(x) property, 203

• J •
joining strings, 126

• K •
Kaufeld, John, Access 2007 For Dummies, 9
keywords
  defined, 38
  help, 40–43, 154
  MsgBox, 176–177
  New, 319
  Private, 18–19
  Public, 18–19, 37
  Set, 146
  syntax, 38–43
  VBA Keyword or Data icon, 78

• L •
learning VBA programming, 356
Left() function, 247
left-click, detecting, 198–199
less than (<) conditional operator, 66
less than or equal to (<=) conditional operator, 66
Levine Young, Margaret, Access 2007 All-in-One Desk Reference For Dummies, 9
libraries
  Access, 32
  accessing, 315–317
  ADODB, 32
  DAO, 32
  defined, 29
  Microsoft Outlook, 323
  Object Library icon, 78
Office, 32, 315–317
references, 316–317
searching, 33–34
setting references to, 30
stdole, 32
VBA, 32
lifetime of variables, 60–61
Limit to List property, 203
linked lists
creating, 217–218
defined, 216–217
dependencies, 217
Linked Table Manager, 297–298
linked tables, 298–299
linking to
external data, 304–305, 309–314
lists across forms, 222–223
list boxes
avoiding retyping common entries, 235–238
creating, 202–203
Default Value property, 203
defined, 201
hidden values, 228–232
ItemData(x) property, 203
linked lists, 216–218
listing field names, 204–206
listing form names, 211–212
listing query names, 208–211
listing report names, 211
listing table names, 208–211
listing table/query field values, 212–215
listing text options, 207–208
Name property, 203
quick find feature, 232–235
Requery method, 223–226
Row Source property, 201, 203, 207
Row Source Type property, 203–208
updating, 219–228, 360–361
Value List, 207–208
Value property, 203
List Rows property, 203
List Width property, 203
listing
field names in a control, 204–206
form names in a control, 211–212
query names in a control, 208–211
report names in a control, 211
table names in a control, 208–211
table/query field values in a control, 212–215
text options in a control, 207–208
literal strings, 157–158
Load event, 98, 218–219, 298
local tables, 298–299
Locals window (VBA Editor), 280–281
Locked property, 96
locking controls, 96
logical errors
debugging, 274–278
defined, 268
logical operators, 67
Long data type
defined, 54
naming conventions, 62
looping through collections, 147–152
loops
conditions, 63–64
defined, 62
Do...Loop, 62–63
For Each...Next, 149–152
For...Next, 64–65
syntax, 63–65
While...Wend, 64
low-level machine language, 266–267

• M •
machine code, 266–267
macros
defined, 10
running Excel macros from Access, 346–347
testing, 346
Mail Merge Wizard, 325
mailing labels, 159–162
Make-Table query, 128–129
members, 76
Members list (Object Browser), 31–32
merging data with a Word document, 328–334
messages
custom messages, 361–362
message boxes, 176–182
methods
ApplyFilter method (DoCmd object), 112
Beep method (DoCmd object), 112
Close method (DoCmd object), 131, 364
CopyObject method (DoCmd object), 113
Default Method icon, 78
defined, 75–76, 82
DeleteObject method (DoCmd object), 113, 131
FindNext method (DoCmd object), 112
FindRecord method (DoCmd object), 112
GoToControl method (DoCmd object), 112
GoToRecord method (DoCmd object), 112, 364
help, 84–85
IntelliSense technology, 76
Method icon, 78
OpenForm method (DoCmd object), 357, 364
OpenReport method (DoCmd object), 364
OutputTo method (DoCmd object), 364
PrintOut method (DoCmd object), 112, 364
Rename method (DoCmd object), 113, 364
Requery, 223–226
RunCommand method (DoCmd object), 113
RunMacro method (DoCmd object), 364
RunSQL method (DoCmd object), 365
Save method (DoCmd object), 112, 365
SelectObject method (DoCmd object), 112, 365
SendObject method (DoCmd object), 113, 365
ShowAllRecords method (DoCmd object), 112
syntax, 82–84
TransferDatabase method (DoCmd object), 302–305
TransferSpreadsheet method (DoCmd object), 365
Microsoft Access
Database Splitter, 295–298
Expression Builder, 239–240
help, 354
importance of understanding how it works, 351
Linked Table Manager, 297–298
Navigation pane, 10
object library, 32
object model, 74
uses for, 1
versions, 1, 9
 wizards, 15
Microsoft Access 2007 Object Library, 32
Microsoft ActiveX Data Objects 2.8 Library, 32
Microsoft Excel
copying recordsets to an Excel worksheet, 342–345
running Excel macros from Access, 346–347
uses for, 334
what-if scenarios, 334–342
Microsoft Office 12.0 Object Library, 32
Microsoft Office 2007 Access database engine Object Library, 32
Microsoft Office applications
Application object, 318
Automation technology, 315, 317
copying recordsets to an Excel worksheet, 342–345
form letters with Word, 326–334
instances, 319–320
Object Browser, 317–318
object libraries, 32, 315–317
running Excel macros from Access, 346–347
sending e-mail via Outlook, 320–324
what-if scenarios with Excel, 334–342
Microsoft Outlook, 320–324
Microsoft Web site, 354
Microsoft Word
bookmarks, 325–327
form letters, 325
Mail Merge Wizard, 325
merging data with a Word document, 328–334
Mid() function, 247
Min Max Buttons property, 186
modal message boxes, 178
Modal property, 186
modifying prewritten code, 48
module-level declaration, 36, 60–61
modules
class modules, 12–15, 87–89
creating, 35–36
declarations area, 60
defined, 10, 12
functions, 241
importing, 47–48
Module icon, 78
opening, 15–16, 21, 24
procedures, 19
standard modules, 12–13
Visual Basic Editor, 15–16, 21
mouse clicks, detecting, 198–199
MouseDown event, 89, 198–199
moving
cursor to a control, 91–92, 359
windows in VBA Editor, 281
MsgBox() function
appearance options, 177–179
asking users questions, 362–363
behavior options, 177–182
custom help access, 180
syntax, 176–177
MsgBox keyword, 176–177
multidimensional arrays, 59–60

N
Name property, 152, 156, 203
named arguments, 45
names
arrays, 59–60
constants, 58
controls, 203
custom functions, 242
objects, 152–153
procedures, 18–19, 37
variables, 58
naming conventions for variables, 61–62
navigating recordsets, 144–145
Navigation Buttons property, 186
Navigation pane (Microsoft Access), 10
New keyword, 319
not equal to (<> ) conditional operator, 66
NOT logical operator, 67
number styles, 103
NumWord() custom function
argument, 251, 256
code listing, 251–253
downloading, 263
Format() built-in function, 258
Nz() built-in function, 257
PrintChecks report, 254–255
values, 257–263
variables, 256–263
Nz() function, 257

O
Object Browser
Classes list, 31–32
closing, 33
Details pane, 31–32
DoCmd object, 113–114, 365
Members list, 31–32
Microsoft Office applications, 317–318
opening, 31
Project/Library list, 31–33
search box, 31–34
split bars, 31–32
uses for, 30–31
viewing currently loaded object libraries, 32–33
writing code, 355
Object data type, 54
object libraries
Access, 32
accessing, 315–317
ADODB, 32
DAO, 32
defined, 29
Microsoft Outlook, 323
Object Library icon, 78
Office, 32, 315–317
references, 316–317
searching, 33–34
setting references to, 30
stdole, 32
VBA, 32
object models, 71–74
object variables, 152–153, 319–320
object-oriented, 10
objects
  Application, 318
  changing appearance of, 99
  changing value of a property, 81–82
  Class icon, 78
  collections, 72–74
  colors, 99–103
  defined, 10, 72
  DoCmd, 112–114, 131, 302–305, 357, 364
  getting the value of a property, 79–81
  help, 76–77
  identifiers, 79–81
  methods, 75–76, 82–84
  names, 152–153
  opacity, 101
  properties, 75–76
  references, 155–157
  transparency, 101
Office applications
  Application object, 318
  Automation technology, 315, 317
  copying recordsets to an Excel worksheet, 342–345
  form letters with Word, 326–334
  instances, 319–320
  Object Browser, 317–318
  object libraries, 32, 315–317
  running Excel macros from Access, 346–347
  sending e-mail via Outlook, 320–324
  what-if scenarios with Excel, 334–342
Office 12.0 Object Library, 32
Office 2007 Access database engine Object Library, 32
OLE Automation object library, 32
  On Change (Change) event, 89
  On Click (Click) event, 89, 198
  On Close (Close) event, 98
  On Current (Current) event, 96–98
  On Delete (Delete) event, 98
  On Error statement, 285–286
  On Load (Load) event, 98, 218–219, 298
  On Mouse Down (MouseDown) event, 89, 198–199
  On Unload (Unload) event, 298
  one-dimensional arrays, 59
opacity of objects, 101
OpenForm method (DoCmd object), 357, 364
opening
  Expression Builder, 239–240
  forms, 107–109, 357
  modules, 15–16, 21, 24
  Object Browser, 31
  property sheet, 74
  recordsets, 143–144
  Visual Basic Editor, 15–16
OpenReport method (DoCmd object), 364
operators
  comparison operators, 66
  logical operators, 67
  OR logical operator, 67
Outlook (Microsoft), 320–324
OutputTo method (DoCmd object), 364

parentheses ()
  functions, 241
  syntax, 353
passing data
  to a function, 242–243
  to procedures in general, 54–57
  PaymentMethod_AfterUpdate() procedure, 92–94
PCase() custom function, 246–250
period (.) delimiter character, 79–80
pipe (|), 63, 103
Pop Up property, 186
pop-up message boxes, 178
positioning cursor, 91–92, 359
prewritten code, 46–48, 355
printing
  checks, 251–255
  reports, 363
PrintOut method (DoCmd object), 112, 364
Private keyword, 18–19
procedure-level declaration, 60–61
procedures
  argument list, 55–57
  calling, 17–18, 171–172
class procedures, 87–89
creating, 36–38
defined, 17
executing, 17–18
Form_Current(), 97–98
Function procedures, 19
modules, 19
names, 18–19, 37
passing data to, 54–57
PaymentMethod_AfterUpdate(), 92–94
Private, 18–19
Public, 18–19, 37
scope, 18–19, 37, 242
SkipLabels, 162–172
Sub procedures, 18–19
testing, 278
programming languages, 266–267
programs. See Microsoft Office applications
Project Explorer (Visual Basic Editor), 23–25
Project icon, 78
Project/Library list (Object Browser), 31–33
properties
Allow Additions, 185
Allow Datasheet View, 185
Allow Deletions, 185
Allow Edits, 185
Allow Filters, 186
Allow Form View, 185
Allow Layout View, 185
Allow PivotChart View, 185
Allow PivotTable View, 185
Back Color, 99, 186
Back Style, 101
Border Color, 99
Border Style, 101, 186
Close Button, 186
colors, 99–100, 186
Control Box, 186
Control Source, 255
Count, 147–148, 152
Cycle, 186
Data Entry, 186
Default Property icon, 77
Default Value, 203
Default View, 185
defined, 73, 75–76
Destination Table, 128
Dividing Lines, 186
Enabled, 90–91
Font Bold, 103
Font Italic, 103
Font Name, 103
Font Size, 103
Font Underline, 103
Fore Color, 99
forms, 184–186, 358
help, 84–85
IntelliSense technology, 76
IsLoaded, 358
ItemData(x), 203
Limit to List, 203
List Rows, 203
List Width, 203
Locked, 96
Min Max Buttons, 186
Modal, 186
Name, 152, 156, 203
Navigation Buttons, 186
Pop Up, 186
Property icon, 77
Record Selectors, 186
Record Source, 165–166, 185
Row Source, 201, 203, 207
Row Source Type, 203–208
Scroll Bars, 186
Special Effect, 104
type, 167
Unique Values, 214
Value, 203
values, 79–82
Visible, 95
Properties window (Visual Basic Editor), 24–25
property sheet, 73–74
Public keyword, 18–19, 37
punctuation marks, 38, 353
queries
  action queries, 121–125, 136–137
  CCSecureQry query, 300–301
  creating, 117–118
  defined, 10
  exporting data, 309–314
  importing data, 302–304, 309–314
  linking to data, 304–305, 309–314
  listing query names in a control, 208–211
  listing table/query field values in a control, 212–215
  Make-Table query, 128–129
  select queries, 121, 137–140
  SQL (Structured Query Language), 117–123
  quick find feature, 232–235
  quotation marks
    double quotation marks (" "), 58, 83, 353
    single quotation marks (’ ’), 83

reading code, 154
read-only controls, 96
Record Selectors property, 186
Record Source property, 165–166, 185
records (rows)
  adding a related record to another table, 109–112
  adding to a table, 131–134
  appending to a table, 131–134
  changing, 134–136
  defined, 10
  deleting, 134–136
  performing an action query on one record, 136–137
recordsets
ADO (ActiveX Data Objects), 141
  closing, 146
  copying to an Excel worksheet, 342–345
  creating, 138–140, 166–167
  creating from external tables, 308–309
DAO (Data Access Objects), 141
  defined, 137
  defining, 141
  filling with data, 142–143
  navigating, 144–145
  opening, 143–144
  referring to fields in a recordset, 145–146
  syntax, 144
  Type property, 167
references
  to fields in a recordset, 145–146
  to object libraries, 316–317
  to objects, 155–157
  to open forms, 358–359
  References dialog box, 30
removing
  records (rows), 134–136
  tables, 130–131
Rename method (DoCmd object), 113, 364
reports
  check-printing report, 254–255
  class modules, 14–15
  defined, 10
  listing report names in a control, 211
  printing, 363
  RecordSource property, 165–166
Requery method, 223–226
Resume statement, 286
returning a value from a function, 243–244
RGB values for colors, 100–101
right-click, detecting, 198–199
Row Source property, 201, 203, 207
Row Source Type property, 203–208
rows (records)
  adding a related record to another table, 109–112
  adding to a table, 131–134
  appending to a table, 131–134
  changing, 134–136
  defined, 10
  deleting, 134–136
  performing an action query on one record, 136–137
RunCommand method (DoCmd object), 113
RunMacro method (DoCmd object), 364
running Excel macros from Access, 346–347
RunSQL method (DoCmd object), 365
runtime, 266–268
runtime errors
  debugging, 283–287
  defined, 268–269

S

Save method (DoCmd object), 112, 365
scope
  procedures, 18–19, 37, 242
  variables, 60–61
Scroll Bars property, 186
search box (Object Browser), 31–34
searching object libraries, 33–34
Select Case block of code, 68–69
select queries
  defined, 121
  recordsets, 137–140
SelectObject method (DoCmd object),
  112, 365
sending e-mail via Outlook, 320–324
SendObject method (DoCmd object),
  113, 365
separators (delimiters), 79–80
server, 295
Set keyword, 146
setting references to object libraries, 30
short names for objects, 152–153
ShowAllRecords method (DoCmd
  object), 112
showing
  controls, 95
  custom messages, 361–362
Simpson, Alan, *Access 2007 All-in-One Desk
  Reference For Dummies*, 9
Single data type
  defined, 54
  naming conventions, 62
single quotation marks (’ ’), 83
sizing windows in VBA Editor, 281
SkipLabels procedure
  calling from an event, 171–172
  code listing, 162–164
  copying the label report, 165
  creating LabelsTempTable from
    MyRecordSet, 166–170
  creating the recordset, 166
  declaring variables, 165
  getting a report’s recordsource, 165–166
  passing data to, 164–165
SkipLabelsForm form, 159–162
Special Effect property, 104
spin box controls, 195–197
split bars (Object Browser), 31–32
splitting databases, 295–298
SQL (Structured Query Language)
  defined, 117–118
  queries, 117–123
  storing SQL statements in variables,
    125–127
  syntax, 118–119
  VBA code, 123–124
  warning messages, 124–125
SQL statements
  CREATE TABLE, 129–130
  INSERT INTO, 132–133
Sqr() function, 241
square brackets ([ ]), 42, 91, 154–155
standard modules. *See also* modules
  creating, 35–36
  defined, 12–13
  functions, 241
statements. *See also* SQL statements
  Debug.Print, 275–278
  defined, 17
  Dim, 152–153
  If...End If, 67–68
  On Error, 285–286
  Resume, 286
  Sub...End Sub, 18–19
  syntax, 351–352
  With...End With, 104–105
stdole object library, 32
stepping through code, 281–282
storing data
  arrays, 58–60
  constants, 57–58
  data types, 53–55
  dialog box settings, 183–184
storing data (continued)
SQL statements in variables, 125–127
variables, 57–58
StrConv() function, 245, 247
String data type
defined, 54
naming conventions, 62
strings
concatenating, 126
joining, 126
literal strings, 157–158
Structured Query Language. See SQL
styles for text and numbers, 103
Sub procedures. See also procedures
defined, 18–19
testing, 278
Sub...End Sub statement, 18–19
subscripts, 58–60
synchronizing forms, 227–228
syntax
arguments, 43–45, 55–56
arrays, 59
blank spaces, 38
comments, 52–53
conditional expressions, 66–67
constants, 58
defined, 38
identifiers, 80
keywords, 38–43
loops, 63–65
methods, 82–84
object variables, 152–153
parentheses (), 353
punctuation marks, 38, 353
recordsets, 144
Select Case block of code, 68–69
SQL statements, 118–119
statements, 351–352
variables, 57–58
Visual Basic Editor, 38–39
system modal, 178

T

tables
adding a related record to another table,
109–112
adding records, 131–134
appending records, 131–134
avoiding multiple tables and links,
305–307
closing, 130–131
creating, 128–130
creating recordsets from external tables,
308–309
defined, 10
deleting, 130–131
exporting data, 309–314
importing data, 302–304, 309–314
Linked Table Manager, 297–298
linked tables, 298–299
linking to external data, 304–305, 309–314
listing query names in a control, 208
listing table names in a control, 209–211
listing table/query field values in a
control, 212–215
local tables, 298–299
testing
custom functions, 244–245
expressions, 26–27
Function procedures, 278
macros, 346
Sub procedures, 278
text styles, 103
TransferDatabase method (DoCmd
object), 302–305
TransferSpreadsheet method (DoCmd
object), 365
transparency of objects, 101
trapping runtime errors, 285
two-dimensional arrays, 59–60
Type property, 167
types of data
Boolean, 53, 62
Byte, 53, 62
Currency, 53, 62
Date, 53, 62
Decimal, 55
defined, 53
Double, 53, 62
Integer, 54, 62
Long, 54, 62
Object, 54
Single, 54, 62
String, 54, 62
Variant, 54, 62
UCase() function, 247
Ulrich Fuller, Laurie, Access 2007 For Dummies, 9
unbound controls, 202
underlines, 103
underscore ( _) continuation character, 157–158
Unique Values property, 214
Unload event, 298
unlocking controls, 96
updating
combo boxes, 219–228, 360–361
list boxes, 219–228, 360–361
User Defined Type icon, 78
user input, 362–363

V
Value List, 207–208
Value property, 203
values
arrays, 59
constants, 58
functions, 241–244
NumWord() custom function, 257–262
properties, 79–82
RGB values for colors, 100–101
variables, 57
variables
creating, 57–58
declaring, 165
defined, 57
lifetime, 60–61
names, 58
naming conventions, 61–62
NumWord() custom function, 256–263
object variables, 152–153, 319–320
scope, 60–61
storing SQL statements in variables, 125–127
syntax, 57–58
values, 57
Variant data type
defined, 54
naming conventions, 62
VBA code
breakpoints, 279–281
bugs (errors), 265
comments, 52–53
copying, 5, 46–47
debugging, 265
defined, 11
Fancy SkipLabels Dialog Box form, 219
linking to external data through code, 304–305
modifying prewritten code, 48
prewritten code, 46–48, 355
reading, 154
SQL (Structured Query Language), 123–124
square brackets ([ ]), 42, 91, 154–155
stepping through code, 281–282
syntax, 38–45
underscore ( _) continuation character, 157–158
uses for, 12
writing, 11–12, 351–356
VBA Editor. See Visual Basic Editor
VBA Keyword or Data icon, 78
VBA object library, 32
VBA (Visual Basic for Applications)
defined, 9, 11
help, 354
learning VBA programming, 356
object library, 32
versions of Microsoft Access, 1, 9
Visible property, 95
Visual Basic Editor
closing, 16–17
Code window, 15, 27–28
debug window, 26
Immediate window, 26–27
Locals window, 280–281
moving windows, 281
opening, 15–16, 21
panes, 22–23
Project Explorer, 23–25
Properties window, 24–25
sizing windows, 281
syntax, 38–39
toolbars, 22
Visual Basic for Applications (VBA)
defined, 9, 11
help, 354
learning VBA programming, 356
object library, 32

• W •

warning messages, 124–125
Web sites
Access 2007 VBA Programming For Dummies, 5
Microsoft, 354
what-if scenarios
creating, 335–342
defined, 334

While...Wend loops, 64
With...End With statement, 104–105
wizards, 15
Word (Microsoft)
  bookmarks, 325–327
  form letters, 325
  Mail Merge Wizard, 325
  merging data with a Word document, 328–334
  writing VBA code, 11–12, 351–356

• X •

XOR logical operator, 67