Combining Grades in the Real World

The following is what I have gleaned from experience, not textbooks.

The Basic Realities

1. Decide what the *approximate* grade distribution for your class will be (e.g., 10-25% A, 20-35% B, 30-50% C, etc.). The textbook doesn't really tell you how to do this, because it cannot. As it notes, this is a matter of school policy and personal judgment. For example, if you like to give impossibly hard tests, this doesn't mean that you are justified in giving all Ds and Fs to your students! There should also be consistency and fairness in grade distributions across different teachers and over time, which only a school policy can assure. (What the grade distribution *should* be is a whole other topic. Just know that there is no *technical* answer to the question "how many As, Bs, etc. should I give?" This is true for both mastery and norm-referenced tests, because both can differ greatly in difficulty.)
2. Grades are assigned throughout the marking period.You will provide grades for each test/assignment when you hand it back (you don't wait till the marking period), because you want to give feedback to students right away on each one. (You may give just number grades back, like 85%, but you will have **already** told students what grade goes with that score—in this case, probably a B.) This means you have to decide what level of performance on each assignment/test deserves which grade (e.g., A, B, C, etc.). This level will be set with two things in mind: (a) what you think the *rough* distribution of grades for a class like this should be and (b) any whether this group of students, test, or testing-learning condition was different than usual. For example, maybe your test turned out to be a lot more difficult than you expected it to be, so you may want to lower the number of points that it takes to get an A, B, etc. Such occasional adjustments would keep your grading standards more comparable from one year to the next.
3. Different assignments are probably "worth" different amounts toward the final grade. For example, you may have 5 items to add together: 3 tests each worth 20%, homework 10%, and a project 30%). You will therefore need to give extra weight to some assignments when adding them up. For that, see below (it's just common sense).
4. All individual grades must be add/averaged together at the end of the marking period. You may have grades of different types to combine somehow: letter grades, percentages, etc.—sort of like adding pints of milk and pounds of flour, or feet and inches. As described below, you need to put them on some common numerical scale. It is handy to use one that students have come to expect: such as 70-79=C, 80-89=B, 90-100=A.

Decision Tree

1. Assign grades (A, B, C, etc.) to score levels for each test or assignment as it comes along.
    a. If criterion-referenced (e.g., a mastery test), then assign them according to what you think corresponds to different levels of mastery (expert, proficient, basic, etc.)
    b. If norm-referenced, and the difficulty level if known (e.g., you've given such tests before and therefore know about how many students will get above 90% correct, 80-89% correct, etc.), then set grades in the same way you did last time.

    c. If norm-referenced, and you don't know what the score distribution is likely to be, then determine where to set the As, Bs, etc. after you give the test and see the scores.
2. Determine whether the grades for *all* tests/assignments are on the same numerical scale. For example, if 70-79=C, 80-89=B, 90-100=A. Or, if A=4, B=3, C=2, D=1, F=0.
    a. If yes, you will be able to just average them *after* you do any weighting that may be necessary in Step 3.
    b. If no, then you need to get them on a common numerical scale before going further. For example, consider our last test and the final project: 40-45=C, 46-51=B, 52-60=A for the test and 70-89=C, 80-89=B, 90-100=A for the project. There are various ways to get these on a common scale, but I have found the following procedure useful.
        i. Decide on a handy scale. Although you don't actually see me do it, I adjust everything to the expected 70%, 80%, 90% scale (or 92% if that is what your school prefers). How?
        ii. First, make the difference between each letter grade the same, in this case, 10 points. Grading for the project is already on this scale, so nothing needs to be done with it. On the test, however, there were just 6 point between each grade (52-46=6, 46-40=6, etc.) For the test, just expand the 6 into 10 by multiplying all the scores by 10/6. Your A, B, C boundaries will now be 67-76=C, 77-86=B, 87-100=A.
        iii. Second, make the cut points (boundaries) for the grades the same, in this case 70=C, 80=B, 90=A. How? Just add 3 points to each score. Voila! It *looks like* percentages now, but in reality is just a handy metric (I could have made it 1-50, 1-400, or whatever.
        iv. Now you will be able to add/average all the scores *after* doing any necessary weighting in Step 3.
3. Determine whether the different tests/assignments are to be weighted differently in the final grade.
    a. If no, then go ahead and average the scores from 2 above, which *already have letter grades attached to them*.
    b. If yes, then weight the scores before you average them.
        i. Multiply each score by the weight the test/assignment has. For example, in the same above you would multiply the sum of the 3 tests' scores (as adjusted (in Step 2 above) by .6, or 60% (or each individual test by .2, or 20%), the homework by .10, and the project by .30, which together add to 1.0, or 100%. (It doesn't matter what you actually multiply by as long as the numbers are in the ratio 6:1:3.)
        ii. Now add all the scores together. You will end up with the total course points for each student on the same old 100-point scale. You already have letter grades attached to your scale.
4. Over time, you may be able to design your tests/assignments so that 90%=A, etc. and then everything will be easy to weight and average at the end of the marking period. Many teachers do this. I tend not to like to do that (to make my tests easy enough that 90%=A), partly because this doesn't leave much "room at the top" for students to do extremely well and possibly compensate for a really low grade on something else.