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More excellent HTML

Built to HTML 4.0 specifications with an Introduction to JavaScript

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with an introduction to JavaScript

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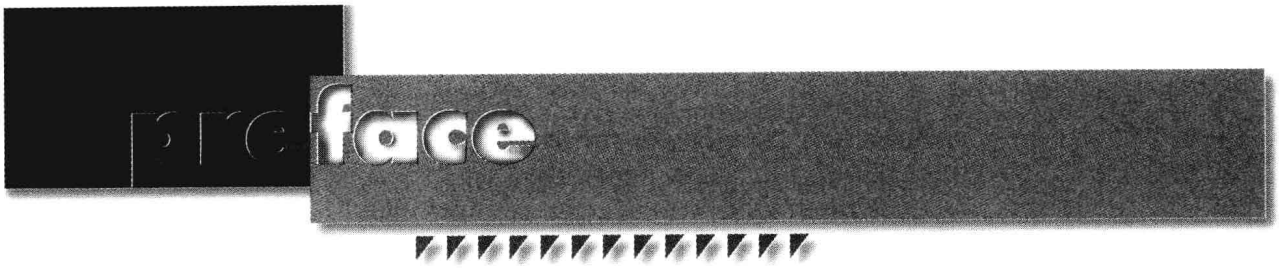

To the Student

This book was written for you. You want to learn how to build and maintain Web pages. You have the tool to help you do that in your hands. When I began to design the HTML course I teach, I couldn't find a book that would work well as a text for the class. There were many technical books and reference manuals available, but none of them written for students, and none were designed to be an aid in learning how to build Web pages. They were, and remain, excellent references once you know what you are doing, but they are not textbooks. I also talked with my students about what they wanted in a text. As a result of all those discussions, I wrote *Excellent HTML with an Introduction to Java Applets.*

After I finished that book, the W^{3}C (World Wide Web Consortium) revised the HTML standard and released HTML 4.0, the current standard. In addition, the world moved away from considering Java applets as the ideal "dynamic" inclusion into Web pages, and JavaScript has come into favor. As the new book began to take shape, Dr. Tim Trainor came on board as co-author, providing new ideas and vision. This created a very dynamic team that has been responsible for this new text. We also had the opportunity to talk to students about what they wanted or needed to learn in order to create their personal and/or commercial Web pages.

There are two ways to approach learning how to code the HyperText Markup Language (HTML) used to create Web pages. **The first way is to just jump in and see what you can hack together through trial and error.** HTML isn't

that complex, and it isn't that difficult to create some, well at least fair, pages that way. However, there are two distinct disadvantages to that approach:

- You can learn some awful habits.
- You miss out on some great techniques.

The second way to learn HTML is to follow a more structured approach:

- First, learning how to use simple tags.
- Then moving on to the more complex ones.

It is very useful and productive to see what you can do with just a handful of selected tags before you start using the really "slick" ones like frames or tables.

This book uses the second approach. You will begin building Web pages in Chapter 2, and keep building more and more complex pages as you work through the text. If you have a special need, feel free to look ahead. Remember, however, we created the exercises at the end of each chapter to give you a chance to gain experience with the new tags you learned in that chapter and refresh your memory on the tags you have already learned.

Welcome to the wonderful world of HTML; it is an exciting place that is changing even as you read this. And one final note: you will read this many times throughout the text, but we would like to focus your attention upon it at the very beginning of your study of HTML. Your job is to provide new and exciting content to the community we call the World Wide Web. Concentrate on the content, and let the browsers that load your pages worry about the formatting. Go play on the Web, and if you want to see what our students are doing, come visit us at **http://phred.dcccd.edu** and **http://student.muskegon.cc.mi.us** and take a look at the student pages hosted there. They have done and are doing some wonderful things.

To the Instructor

Teaching HTML is challenging and exciting. In part, I developed my first book because I was frustrated with the texts currently being used to teach HTML. There were reference books and technical manuals available, but nothing designed to be used in the classroom. My students come to the class with a wide range of computer expertise, from the absolute novice to the professional programmer. I wrote my first book to make it easier to teach HTML, and to give the students the text they needed to succeed.

Then the World Wide Web Consortium (W^3C) revised the HTML standard and released HTML 4.0. In addition, my students and instructors around the country began expressing a stronger interest in JavaScript than in Java applets. Here was a chance for me to take a fresh look at Web page creation. Dr. Tim Trainor joined the project bringing his years of HTML teaching experience, his wit, and his wonderful ideas.

The book you hold in your hands has been tweaked and refined in the crucible of the classroom. It is designed to take the student from an overview of the history and origins of HTML through the design and development of clean, easy to maintain Web pages using stylesheets, JavaScript, and other dynamic HTML features. We have woven the new specifications throughout the text. Unlike many of the texts on the market that address Dynamic HTML and the 4.0 standard in just a chapter or two, we have built them into this text from the beginning. The first seven chapters have very few examples of styles and

stylesheets, because we want the student to learn how to use the inline tags first. Starting in Chapter 8, where we introduce styles, and continuing throughout the rest of the book, the examples use style elements. The chapters about JavaScript and the other features of Dynamic HTML provide the students with a solid grounding in those techniques as well.

In writing this book we have not assumed the reader, your student, has an in-depth background with computers, but it would be a good idea if the student were minimally computer literate. We ourselves have had a couple of students who were new to computing and they succeeded, albeit by putting in some serious work.

The text is laid out in the order we teach our own classes. It starts with some simple tags, and progresses into the more sophisticated tags as the students become comfortable with the format and syntax of HTML. Although you don't have to follow any particular order (since most chapters can pretty much stand alone), there are a few back references that give the students grounding and refresh concepts. As each new tag is introduced, there are both examples of the HTML code and screen captures showing what that code generates. This allows the students to play with HTML and compare their results to those shown in the text. At the end of the chapter, there are sets of exercises that enable the student to create pages using the tags they have learned. The design process (and some of the exercises) build from chapter to chapter. In our experience, this is the best way to teach HTML. Give the students a tag, tell them how it works, and then let them use it. That way they can have actual hands-on experience with the tags and they tend to learn more quickly.

The physical layout of the content is geared to serve the student as a reference, but also to provide an advanced organizer for your lecture. Each new tag is enclosed within a graphical element showing the tag name, type of tag, a list of its attributes, and special notes on the use of that tag. You don't have to have several texts open at the same time, as you lecture; all the information is right there for you.

There is a wealth of ancillary tools that come with the text as well. They include:

1. A Web site that contains the JavaScript and most of the HTML examples from the book as well as Instructor notes, suggestions, and a sample syllabus.
2. A CD, included with the book that contains
   - Most of the HTML examples from the text.
   - All the JavaScripts used in the book, with a simple HTML page to drive each.
   - A selection of buttons, backgrounds, and lines for use on Web pages.
   - CuteFTP, a handy file transfer protocol tool to move data across the Web.
   - HomeSite, a powerful HTML editor.
   - ColdFusion, a Web site design tool.
   - HotDog, another HTML editor. (There are some examples that use HotDog in the text.)
   - MapEdit, a wonderful tool for producing image maps easily and quickly.
   - Scriptbuilder, a great way to create JavaScripts easily.
   - PaintShop Pro to create art for the pages.
   - WinZip, a useful tool for compressing HTML and images before shipping them across the Web.
   - CSE HTML Validator, a really neat HTML validation program that will check for both required and recommended HTML syntax.

You and your students can access the HTML examples by pointing your browser at D:/html/index.html—this assumes that D: is your CD-ROM drive.

The HTML index gives access to the different chapter indices, each of which provides the HTML examples for the figures in that chapter. In some cases, there is more than one example of the same HTML, or HTML examples that are very similar. They are included for completeness and to keep in step with the text. You can run the HTML code from any browser that supports the HTML 4.0 standard. Actually, you can use a browser that supports the 3.2 standard, but some of the new, dynamic features won't appear.

Some of the software on the CD is made up of demo versions of the products. *They are full-featured software, but they expire after 30 days.* For that reason, you may wish to wait to have the students install them until a couple of weeks into the semester. We don't let our students use the features of the page development tools until the final project. Up to that point, they only use HotDog (Tim G.) or Notepad (Tim T.) as an ASCII editor. That requires them to learn how the HTML code is actually built. It also requires them to learn the syntax and order of the various tags. If they begin by using all the features of an HTML development tool, they become dependent upon the tool and then encounter difficulty if they need to modify their code on the server. (The first time Tim G. taught HTML, he allowed the students to use all the features of the HTML editors, and his students had many problems later, because they didn't learn the codes, only how to invoke the tools to create the codes.) We both restrict how much our students are allowed to do with the HTML editors, and things have gone much more smoothly. For example, creating the correct path to an image can be tricky. If the students have to hand-build the path, they learn how HTML renders the address. If all they have to do is click on the target icon, and then browse for the correct file name, they won't necessarily learn how to create the correct path. There are other editing tools available for download from the Web. Explore, you might find others that you really like.

The most important thing about this or any text is that it should free you to focus on your teaching. Enjoy it, enjoy your students, and have fun!

Acknowledgments

Creating a book is a time consuming process. First and foremost, I want to thank Patti and Richard for the time they sacrificed to allow me time to write, and for the support they provided throughout the whole process. Thanks, you two: I owe you, again!

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Tim Gottleber

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Tim Trainor

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