

Point-of-View

# HTML e-Mail Rendering in Outlook 2007

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## Overview

On January 30, 2007, Microsoft launched its new Vista operating system—the largest update to the Windows operating system since Windows 95. Simultaneously, the company also launched the newest version of its Office suite, Microsoft Office 2007. The new, softer graphical user interface and “ribbon” button bar of Office 2007 complement the visual elements of Vista to create an integrated personal computing experience.

Along with the launch of Office 2007 came a new release of Microsoft Outlook 2007. Widely anticipated for its new categorization and indexing features, Outlook 2007 now uses only the Microsoft Word HTML engine used for editing/composing of e-mail and not the standard Internet Explorer engine also previously used for reading/rendering HTML e-mail. This imposes numerous limitations on the rendering of HTML e-mail (see figure 1). Reports differ as to whether Microsoft developers made these highly criticized changes to reduce the work of developing for two separate HTML engines in Outlook or for security reasons (to better block viruses, worms and phishing attempts). In any case, the result is a shift in how HTML e-mail should be designed to render correctly.

Luckily, many of the limitations in the HTML rendering introduced by Outlook 2007 are avoided by simply following some key guidelines. However, there are still a few major issues which will affect the creative interactivity of e-mails as well as their functionality. All will greatly influence the way HTML e-mail needs to be coded for compatibility in the future.



Figure 1

On the left an e-mail as displayed in Outlook 2003, and on the right the same e-mail in Outlook 2007. Note the missing copy in the upper-right, broken link, and breaks in the table.



## Designing HTML E-mails for Outlook 2007 – The New Blueprint

e-Dialog has a well established set of best practices for developing HTML e-mail for compatibility on most e-mail clients. These guidelines ensure an HTML e-mail will look the same in IE, Netscape, and Mozilla browsers in all of the major Webmail clients (i.e., Yahoo!, Google, MSN/Hotmail, as well as Outlook, Outlook Express, Eudora and Thunderbird e-mail clients). The following outlines the major changes to HTML e-mail in Outlook 2007, detailing what is no longer supported, and provides some initial best-practice workarounds for those changes. As we discover new information and test new HTML and CSS elements, e-Dialog will update this document.

### If You Can Change Only One Thing, Always Use a Hosted E-Mail Link

Including a URL that will render the customer's e-mail in a Web browser is the ultimate workaround for ensuring they will still enjoy the most creative and interactive experience. Use language such as, "View this message in a Web browser" or "Trouble viewing the below message? Click here" (see figure 2). This will resolve any issues caused by the e-mail client's HTML rendering capacity by using the forgiving engine in Internet Explorer, Safari, Mozilla or other W3C standard browsers and should be considered a requirement on all e-mails.



Figure 2

In this example the hosted e-mail link is positioned on the left side of the page, above the header. This ensures it will be above the fold and easy for the recipient to find if images are blocked.

## Major Outlook 2007 HTML E-mail Limitations and Solutions

### 1. Limitation: No form functionality

Embedded polls, surveys, forward-to-friend and search forms are no longer active. Fields (text input, dropdowns, radio buttons and checkboxes) are replaced with "[ ]", and buttons are deactivated.

#### Solution: Make forms actionable

As search forms and polls are often the most active and popular links in an e-mail, ensure that any form in the HTML e-mail is accompanied by a link to try it online if not available (see figure 3). This best practice also extends to Webmail clients, which often change security settings. Other possibilities include linking the name of the form itself, e.g. "Find a store near you!" or "Search," to a page online.



## 2. Limitation: No background images in HTML <table> tags or CSS

Background images are used to achieve many creative effects in e-mail; for example, to add a gradient or pattern behind a paragraph, to repeat a shaded border for expanding content within a newsletter template, to display an image as a workaround for when a Flash movie doesn't appear. In Outlook 2007 background images are not supported in CSS or in <table> tags.

### **Solution: Make one large background image for the <body> tag, encompassing the whole design**

Though disabled in CSS and <table> tags, a background image can still be placed in the <body> tag. It's important to note that most Webmail clients strip out the <body> tag, so this "one large background image" solution should be applied to both <table> and <body>, making it Webmail and Outlook 2007 compliant. Note that other creative design techniques could be applied to compensate for this loss of background image support.

#### **Figure 3**

In the example below, entering "ring" in the search field and clicking "go" would perform a search of the Ross Simons Web site and take the customer to the search results. If that functionality is disabled, clicking the "search" link will take the customer to the Ross Simons home page to perform the search there.



## 3. Limitation: No animated GIFs

Other than Flash, animated GIF images are the only animation possibility available for HTML e-mail. However, in Outlook 2007 only the first frame of the animated GIF will render.

### **Solution: Make the first frame count**

This limitation is more of a heartache than it is a headache. Just ensure the first frame of any animated GIF includes and communicates the message or objective of the image because this is the only frame that will be rendered in Outlook 2007.

## 4. Limitation: No embedded style sheet support

If linked or positioned above the <body> tag, embedded style sheets are stripped in most Webmail clients.

### **Solution: Use inline <font> style attributes instead**

As Webmail clients differ on embedded style-sheet support, it is strongly recommended that e-mails be styled using inline <font> style attributes rather than cascading style sheets (CSS). These inline styles will render fine in Outlook 2007, and should provide the most compatible and supported solution across all e-mail clients. This lack of support for embedded style sheets should have little impact aside from CSS positioning tactics which should be avoided as a general HTML e-mail best practice.



## Minor Outlook 2007 HTML E-mail Limitations

1. No support for Flash or other plug-ins
2. No support for positioning via CSS
3. No support for replacing standard HTML bullets with images

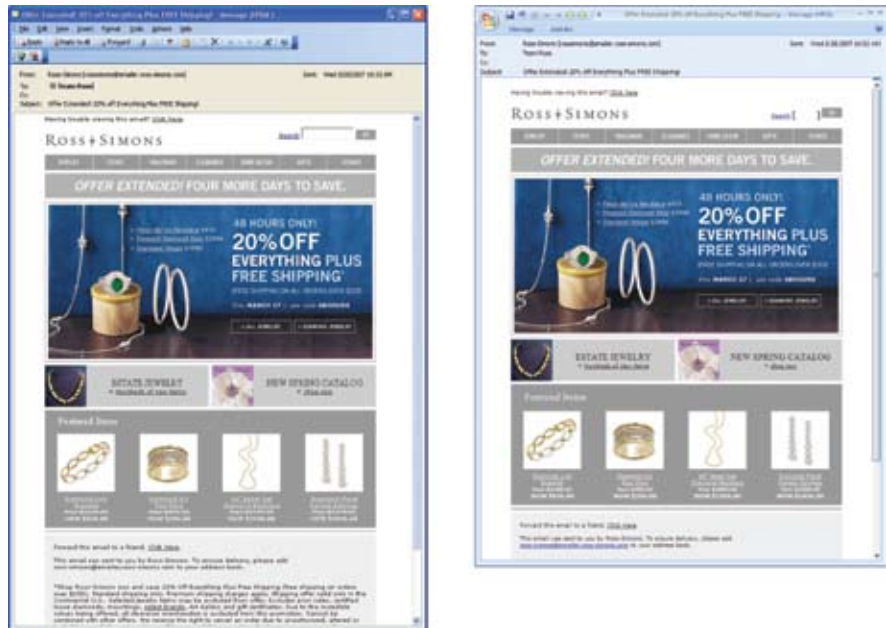
### Conclusion

The stricter HTML requirements bestowed upon us by Outlook 2007 will lead to much cleaner e-mails. By following e-Dialog's best practices presented here, e-mail messages will look the same in Outlook 2007 as they do in Outlook 2003 (see figure 4).

It's important to note that while slightly less creative and interactive, these new design strategies may serve as a path to mobile messaging. HTML e-mail on mobile devices has had very little support from technology providers to this point, but Apple's new iPhone due early this summer will be one of the first devices to support HTML e-mail.

**Figure 4**

In this example, on the left is the e-mail as seen in Outlook 2003, and the same e-mail viewed in Outlook 2007 on the right. In comparison to Figure 1, notice that there are no missing images or misaligned tables.





### **Additional Resources**

More information from Microsoft on exactly what is and is not available in Outlook 2007 can be found here: <http://msdn2.microsoft.com/en-us/library/aa338201.aspx>

You may also download a tool from Microsoft to test HTML rendering in Outlook 2007 via the following link: <http://www.microsoft.com/downloads/details.aspx?familyid=0b764c08-0f86-431e-8bd5-ef0e9ce26a3a&displaylang=en>