



*By distorting the truth, anyone can make a holiday dinner sound like a carcinogen-filled threat.*

## **Chemicals and the world we live in**

### *A closer look at chemicals, PFOA and human safety*

**T**he supply of foodstuffs in most developed countries of the world today is better and more healthful than it has ever been, and continues to improve. That includes the depth and breadth of what is available, and its safety.

Much of this is due to the judicious use of chemicals (pesticides and others), most of which are synthetic and the result of man's ability to innovate and improve.

Yet the media carry increasing amounts of scare headlines threatening our health from carcinogens and poisons, supposedly an unavoidable part of these man-made chemicals. Not just those used in the production of food, but many others used to produce a wide variety of products crucial to hundreds of industries.

#### **Green: the good and the bad**

Fortunately, the move toward a cleaner, safer environment continues to put pressure on those who continue to contaminate. Unfortunately, there is a radical element to the "green" movement which can actually do considerable harm by dis-

torting the truth about chemicals.

PFOA, for example, has gotten significant press. PFOA, an ingredient used in the manufacture of fluoropolymer dispersions, has been vilified as a serious problem in nonstick cookware, and has even been called a "likely carcinogen" by some radical environmentalists.

Those in the cookware industry know that virtually all the tiny amount of PFOA used is destroyed by the curing process. As a result, in every test conducted under normal cooking conditions, no trace of PFOA has been found in a nonstick pan.

The point is that, if there are trace amounts of PFOA in nonstick cookware, they are negligible, and it is safe to assume they can do no harm.

#### **Distorting the truth**

Here's a little-known fact (as presented by the American Council on Science and Health [ACHS]). A standard American holiday dinner of appetizers, salad, turkey, potatoes, green veg-

etables, wine, pie, coffee and tea is rife with rodent carcinogens, *elements that have caused cancer in rodents when taken in sufficient doses over long periods of time.*

In fact, such a dinner includes 32 different carcinogens.

Does this make the dinner a health risk? Of course not. But, given the inclination for the radical element to distort, anyone who wished to publish a report that such a meal contained 32 carcinogens would be technically correct — even if what the reader took away from the report would likely be a dramatically mistaken impression (and a lost appetite).

The media seem to concentrate on synthetic chemicals while ignoring the many carcinogenic chemicals that occur naturally in much of what we eat. Yet such rodent carcinogens abound in nature.

As the American Council on Science and Health (ACSH) points out, “Human dietary intake of nature’s pesticides is about 10,000 times higher than human intake of synthetic pesticides that are rodent carcinogens”.

When was the last time you read a report in the media condemning exposure to nature’s chemicals?

The ACSH states, “All chemicals, whether natural or synthetic, are potential toxicants at high doses but are perfectly safe when consumed in low doses”. Three examples: Lima beans contain hydrogen cyanide, often used to commit suicide. Potatoes contain arsenic. Carrots contain carototoxin, a nerve poison

The ACSH (to which we owe our thanks for the information contained herein) summarizes by saying, “When it comes to toxicants in the diet — natural or synthetic — the dose makes the poison” (emphasis ours).

### **What to do**

One cannot overstate the importance of pro-

tecting our families from consuming dangerous chemicals. There have been far too many examples of industry irresponsibility in the handling of toxic chemicals. Fortunately, regulations have toughened, as has their application.

That, however, has not stopped the media offensive by radical environmentalists against synthetic chemicals via grossly exaggerated claims about miniscule amounts of chemicals “poisoning our atmosphere”.

Nor are such attacks likely to stop.

### **What about PFOA?**

Whitford (and other reputable coating manufacturers) have already reduced what little PFOA is used in fluoropolymers by more than 90% over the past few years. Further, based on an agreement with the EPA, PFOA will disappear entirely from the fluoropolymer manufacturing process in western nations by 2015.

In addition, Whitford (and others) have been offering low PFOA and, more recently, PFOA-free nonstick coatings.

The key point is: beware those who are more interested in eye-catching headlines than the truth.

PFOA from nonstick coatings was never a serious problem. One could easily make the case that it was never even a problem.

Nonstick coatings have been around for almost 60 years and have been safely used by hundreds of millions of consumers around the world. In fact, they are one of the safest products ever launched.

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### **More information?**

If you have any questions about PFOA or nonstick coatings, please contact your Whitford representative or Whitford directly (email: [sales@whitfordww.com](mailto:sales@whitfordww.com); website: [whitfordww.com](http://whitfordww.com)).



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## Thanksgiving Dinner: What to be thankful for (such as the 32 carcinogens you'll ingest)

### Appetizers

Cream of mushroom soup

*Hydrazines*

Carrots

*Aniline, caffeic acid, carototoxin*

Cherry tomatoes

*Benzaldehyde, caffeic acid, hydrogen peroxide, quercetin glycosides*

Celery

*Caffeic acid, furan derivatives, psoralens*

Mixed roasted nuts

*Aflatoxin, furfural*

Lettuce, arugula salad with basil-mustard vinaigrette

*Hallyl isothiocyanate, caffeic acid, estragole, methyl eugenol*

### Entree

Roast turkey

*Heterocyclic amines*

Bread stuffing (onions, celery, black pepper, mushrooms)

*Acrylamide, ethyl alcohol, benzo(a)pyrene, ethyl carbamate,*

*furan derivatives, furfural, dihydrazines,*

*d-limonene, psoralens, quercetin glycosides, safrole*

Cranberry sauce

*Furan derivatives*

### Vegetables

Broccoli spears

*Allyl isothiocyanate*

Sweet potato

*Ethyl alcohol, furfural*

### Rolls with butter

*Acetaldehyde, acrylamide, benzene, ethyl alcohol,*

*benzo(a)pyrene, ethyl carbamate, furan derivative, furfural*

### Desserts

Pumpkin pie

*Benzo(a)pyrene, coumarin, methyl eugenol, safrole*

Apple pie:

*Acetaldehyde, caffeic acid, coumarin, estragole, ethyl alcohol,*

*methyl eugenol, quercetin glycoside, safrole*

### Beverages

Red, white wine

*Ethyl alcohol, ethyl carbamate*

Coffee

*Benzo(a)pyrene, benzaldehyde, benzene, benzofuran*

*caffeic acid, catechol, 1,2,5,6-dibenz(a)anthracene,*

*ethyl benzene, furan, furfural, hydrogen peroxide,*

*hydroquinone, d-limonene, 4-methylcatechol*

Tea

*Benzo(a)pyrene, quercetin glycosides*