2019 R&D Trends Report

Our **48th annual R&D Survey** finds cleaning up labels a priority, but so is 'really new' product development.

One of the big takeaways from ***Food Processing's*** 48th annual R&D survey is ... taking away.

In a trend that's been going on for a few years, one priority of product development is removing ingredients that interfere with the clean labels so desired in today's market.

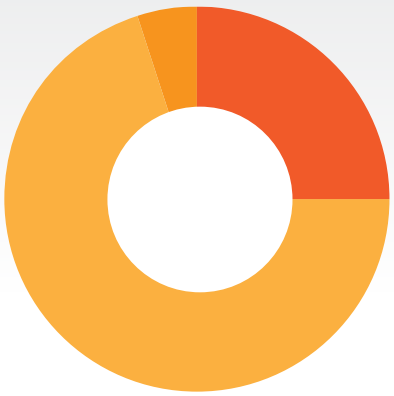
Our survey was taken online from March through early April, with 258 responses. Regarding priorities, "cleaning up current products" came in at 16 percent, behind "really new product development" (37 percent) and "existing product improvement" (20 percent). Another 13 percent said their biggest priority was "product line extensions," while 10 percent named "cost control."

When asked which specific types of ingredients they expect to work on most this year, the first four named by our respondents were things they wanted to remove: added sugars (27 percent), GMO ingredients (21 percent), sodium and synthetic colors (19 percent each). The top ingredient category that R&D teams want to add, fruits and vegetables, came in at only 16 percent. Others included fiber (10 percent) and vitamins (9 percent).

In this regard, R&D teams are only doing what they're supposed to, which is following consumers' preferences. According to Innova, close to three-quarters of American consumers "strongly agree" that it's important for foods to have mostly recognizable ingredients. According to a poll by PR agency Ingredient Communications, just about that many are willing to pay more for such products.

In some cases, consumer preferences get translated directly into trade customer preferences. One employee of a pet food manufacturer said, "Due to Petco's new rules, all pet foods must be all natural, no artificial dyes, preservatives, etc."

For some of our respondents, impetus for removing added sugars was undoubtedly sparked by the new regulations mandating their listing on the Nutrition Facts label. "Those changes [to the label] are the most important reason for our changes," one wrote.



Are you making any changes to accommodate the Nutrition Facts panel?

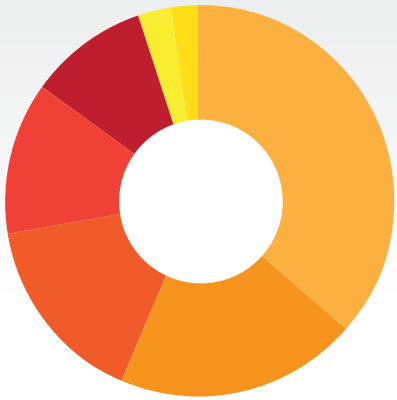
- Yes..... 25% (LY 45%)
- No..... 70% (LY 53%)
- Not sure..... 5% (NA)

But overall, the upcoming changes to Nutrition Facts wasn't a big motivator: 70 percent said they weren't making any changes on that basis, and only 25 percent said they were. One respondent wrote that his team was removing sugars and other ingredients, "but not due to the changes in the panel. We are making changes based on customer desires which include healthier options."

Modification preparation

One of the biggest changes to the formulation landscape will occur by 2022, when foods that use genetically modified, or bioengineered, ingredients will have to say so on their labels. Non-GMO certification is a goal for 49 percent of our respondents; the rest will either use the USDA's bioengineered label, put their GMO notifications online via the SmartLabel phone-scan code from the Grocery Manufacturers Association, or are already declaring on their labels that they use GMOs.

The drive to get GMOs out of products jibes with the wider drive to "clean up" ingredient labels. This takes many forms; written responses included: "Removing artificial ingredients and colors, removing complex/complicated ingredients"; "removing modified starches"; "No sugar. Natural flavors. Quality ingredient forms"; and "increasing the use of natural preservatives, reducing the use of allergens."



Which of the following will be most important for your R&D efforts this year?

- "Really new" product development..... 37% (LY 33%; 42%)
- Existing product improvement..... 20% (LY16%; 2017 17%)
- "Cleaning up" current products..... 16% (LY 23%; 2017 22%)
- Product line extensions..... 13% (LY7.9%; 2017 11%)
- Cost control..... 10% (LY 14%; 2017 5.9%)
- Prepare for new Nutrition Facts panel..... 3% (LY 4.6%)
- Other..... 2% (NA)

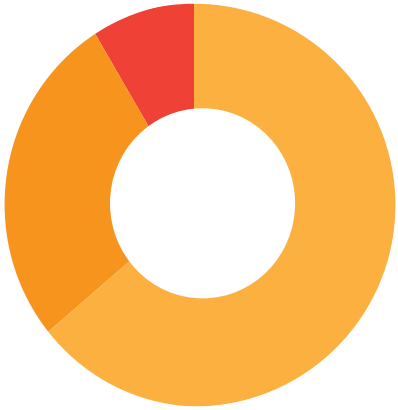
One said simply, "Everything in our power." One wrote, probably puckishly, "Working with a label company to produce laminated labels." Another raised a concern about cost: "Substituting ingredients on a case-by-case basis since customers don't all have the same definition of clean label, especially after they see the price impact."

Other goals sought after by R&D include: "Shelf life is a priority to improve cost efficiency from seasonal buys and reduce waste"; "Opening of new facility has us cutting cost in extra budget items"; and "Don't need to work on ingredients, maybe work on texture, without any additives."

Time is of the essence

Whatever the goals of R&D, one thing a lot of our respondents say is that they have to reach those goals ASAP. "Steadily increasing pressure" to get new products to market quickly was reported by 43 percent; another 8 percent said "very intense pressure, and it's worsening." One respondent wrote: "One-man show ... feet taped to the pedals! Innovate or die!"

Hank Cardello, a former food industry executive and a senior fellow at



Do you have a formal product development team?

- Yes 63% (LY 73%; 2017 70%)
- No 28% (LY 21%; 2017 24%)
- Sort of 8% (LY 5.9%; 2017 6.3%)

In the past few years, how much pressure have you felt to get new products to market more quickly?

- Steadily increasing pressure 43%
- Very intense and worsening pressure 8%
- Average pressure with little change 35%
- Little or no pressure 14%

What happened to your R&D budget this year?

- About the same 50% (LY40%; 2017 46%)
- Increased 20% (LY 17%; 2017 23%)
- Decreased 11% (LY16%; 2017 8.5%)
- Don't know 19% (LY26%; 2017 23%)

the Hudson Institute, says the industry has been historically slow in introducing new products, partly because of their failure rate, which has gone as high as 90 percent. But larger companies are facing competition in innovation not just from smaller, niche firms, but from increasingly specialized private label offerings. That heightens the danger of being left behind, he says.

"Is it risk if I make a boo-boo with a failing product? Or if I do nothing for a year, am I in worse shape?" he says. "And I think that's what's happening right now – they're realizing that something's better than nothing."

Eddie Yoon, a consumer industry consultant and author of the book "Superconsumers," says that the pressure for increased speed to market is part of the general pressure for better short-term financial results. "It's a Wall Street problem again," he says.

Many food companies are pushing out new products simply in the hope that it increases the odds that one of them will stick, Yoon says.

"Basically, everybody's batting averages are getting worse and worse," he says. "So they're trying to solve it by saying, 'Let's get more at-bats.' The right answer would be to slow it down and emphasize quality over quantity."

Who's on the team?

As for how innovation comes together, our respondents reported working from a variety of models. Almost two-thirds (62 percent) have a formal product development team; 28 percent don't, and 8 percent say "sort of." These were mostly small companies, some of them very small, like the one who wrote "we are a small company of 6, so there is only 1 PD [product development] person." Another described the team as "Myself, sales, plant manager and QA manager as needed."

The most common members of the product development team, after R&D personnel, were the ones who tend to be on either side of R&D: marketing (55 percent) and manufacturing (50 percent). Other common team members include corporate management (32 percent), purchasing (27 percent) and finance (18 percent). Write-in choices included quality assurance and, in the case of a private label manufacturer, "R&D staff from our clients."

Several respondents remarked that R&D's priorities, or lack thereof, were directly affected by management. "Many items are due to major changes in executive structure," said one. Another poor fellow said only, regarding his department's objective, "It was not disclosed by management."

This attitude is sadly common, according to many industry observers. Yoon says flatly: "No one really fully understands how important R&D is in food – even the R&D community."

Yoon says that truly disruptive technology often gets rejected precisely because it's disruptive.

"I have seen some amazing technologies the R&D community has that CEOs ignore," he says. "Or even, the level below the head of R&D will share with me some amazing stuff that the head of R&D will not pass along out of job security or fear of rejection or whatever, because they know it will disrupt the core business and the CEO has no interest in doing that."

Cardello says more food company managers need to think of R&D as an equal partner. That's not always easy, since not many of them have direct experience with R&D.

"For packaged goods companies, the pathway to senior executive positions generally runs through brand management, marketing, etc.," he says. "The marketers' instinct is 'How do I squeeze a little more business out of my brand?' as opposed to 'How do I make the next leap?' "

The structure of the product development team, both internally and in the sense of how and to whom it reports, reflects how many food companies are

How long does it take you to get new products to market?

3 months	12%
6 months	37%
Nearly a year	32%
13 to 23 months	13%
24 months or more	6%

Who is on your product development team?

Research & development	87%
Marketing	55%
Manufacturing	50%
Corporate management	32%
Purchasing	27%
Outside consultants	19%
Multiple suppliers	19%
Finance	18%
A single supplier	3.2%
Others or "Don't have a team"	14%

How is your company responding to mandatory GMO/BE labeling?

Seeking non-GMO certification	49% (LY 39%)
Will use GMA's SmartLabel	22% (LY 11%)
Will use USDA's symbol	20% (LY 27%)
Using our own GMO declaration	17% (NA)

How do you get new product ideas?

General market research	78%
Internal research	53%
Open innovation	40%
Focus groups	36%
Suppliers	35%
Third-party product developers	10%

having a hard time innovating, says Rick Slayton, CEO of Slayton Search Partners, an executive search consultancy. Slayton says many food companies are struggling to reinvent themselves, to keep pace with rapidly changing consumer preferences and to achieve truly breakthrough innovation.

"The challenge is pace – often these acquisitions aren't keeping pace with the slow growth of their core business, creating significant pressure within research and development teams," Slayton says. functions." This is easier in small companies than in larger ones, he says.

Meet and fitting

R&D teams vary, not only in composition, but in the frequency with which they meet. The most common schedule apparently is no schedule at all; 26 percent said their teams don't meet regularly. About as many said they meet weekly or more often.

"A big part of this is whether the company has formal processes and just how structured they are," Slayton says. "Some companies tend to be less process oriented, loose, and non-structured, and feel product development teams should meet [only] when there is cause. In other instances we see companies pull together cross-functional product development teams that pair R&D, sales, marketing, and supply chain with the intent of visibility across the entire product life cycle."

Ideas, as they are wont to do, come from multiple sources. The most common is "general market research," at 78 percent. Other popular choices are "internal research," 53 percent; "open innovation," 40 percent; "focus groups," 36 percent, and "research provided by suppliers," at 35 percent.

If budgets are any indication, R&D remains at least a significant priority for the industry. Half said their R&D departments' budgets remained the same as last year, and 20 percent more said it had increased. Another 19 percent said they didn't know. One respondent said it's not about budgets: "Our R&D department operates on projects dictated by the owners/sales/marketing regardless of budget." Similarly, a respondent from a small company wrote: "I do R&D, quality control, customer complaints. We don't have a set budget, we usually go with what is needed."

But Cardello is emphatic that food R&D tends to be underfunded. He points out that according to research by PwC, the biggest food companies spend only 1.4 percent of their revenues on research.

"Marketers tend to have the most money in the company – buying the media and everything else, there's a lot of money for that, for market research, etc.," he says. "And we know that the innovation/R&D side doesn't have nearly as much capital to work with, and I think that has to be brought back to balance. From the CEO and board level, I think they need to ensure that if they want to be successful going forward. The old model's not going to work." FP