Task Group on Food Shields
Teleconference Meeting Summary
February 13, 2013

Participating members:
Michael Perez (Baring Industries)
Chris Cummings (Premier Brass)
Tony Gagliardi (Consultant – Public Health)
Pep Matus (Versa-Guard)
Andrew Padden (BSI)
John Scanlon (Hatco)
George Zawacki (CAD Solutions Groups, Inc. (CSG))

Absent members:
Anthony Carotenuto (Navy and Marine Corps Public Health Center)
Amy Cashen (Delfield)
Mike Kohler (NSF)
Randy Lines (Duke Manufacturing)
Thomas McNeil (U.S. Army)

Secretariat:
Monica Leslie (NSF)

Participating observers:
Jeff Differt (Hatco)
Zac Heisler (Nemco)

Supplemental Materials Referenced
2i20r1; 01-12-2013
2i20r1 Food Shields Issue Document Index; 02-12-2013
Food Shield Requirements Criteria; 02-11-2013
Annex XX End Shield Requirements Criteria; 02-11-2013
Standard 2 Task Group on Food Shields – Figure 2; 06-17-2011

Action Items:

1. M. Perez will revise the Annex XX End Shield Requirements Criteria and provide diagrams to illustrate portions of the annex
2. M. Leslie to provide M. Perez with the disclaimer language for the annex
3. M. Perez volunteered to do some research and touch base with K. Smith to see what the food code says about the barrier requirement.
4. P. Matus will provide criteria for the group to review on the roller grill food shields.
5. M. Leslie to provide a March 13, 2013 folder on the Workspace to upload documents.

Discussion

M. Leslie read the antitrust statement and took the attendance. There was a quorum for this meeting.

Roller Grills

M. Perez brought up the topic of roller grills food shields. There was a fair amount of pushback on these products and the emails were shared with the group. Zac Heisler from Nemco was invited to participate and joined this call.

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2i20r1 Draft

M. Perez reviewed the changes made to the sections 5.35.1.5 and 5.35.4.1 of the draft based on discussion during the February teleconference. The revision to 5.35.4.1 now reads:

"Vertical food shields shall provide a barrier to a minimum height of 60 in (1524 mm) above the finished floor. The manufacturer's product information, installation instructions, and/or shop drawings shall include guidelines for meeting the 60 in (1524 mm) minimum height requirement."

This had been incorrectly modified but has now reverted back to the language in the April 25, 2012 draft.

2i20r1 Food Shields Issue Document Index

M. Perez updated the task group on the status of the issue documents under review by the task group. To date the task group has completed its review of 11 issue documents and 4 informal issue papers. Only FE-2009-6 submitted by M. Perez is remaining The risk analysis study associated with FE-2010-1 and -2 and under discussion by NSF and FCSI is still in work as well. FE-2009-6 will be included on the agenda for the March teleconference. The group is getting close to being able to ballot changes to the standard.

Food Shield Requirements Criteria

This is the annex that the TG drafted as an informative supplement to the current version of the standard. M. Perez made minor revisions to correct typographical errors. It is a reference document that outlines the assumptions that were used and the background scientific data that was used.

Annex XX End Shield Requirements Criteria

This is a new document. A year ago the TG was struggling with how to write requirements or allow exceptions when end shields could be omitted. It got so complicated that the group decided to exclude those exceptions from the requirements themselves because much of that has to do with how a food shield is installed not how it is certified. The TG felt strongly that there should be some criteria to provide guidance to manufacturers, installers, and end users about when end shields could be omitted. For example, when a series of food shields are installed end-to-end on a buffet counter, end shields on every food shield unnecessarily clutter the counter top and may interfere with the operation of the counter. M. Perez drafted this first draft of the annex.

The End Shield Requirements Criteria document was reviewed to determine the need to make edits. M. Perez reviewed the document during this meeting.

On the criteria at the bottom of this document, P. Matus pointed out that requirement 1 does not permit an opening between food shield panels to exceed 2". In criteria 2 a food shield with two 1" diameter posts spaced 2" apart and with the glass on the inside of the posts, there would be a gap of 4" between the two glass panels. A 4" gap between food shield panels directly conflicts 5.35.1.7 that requires the open space

between two food shield panels be no larger than 2". M. Perez noted that food shield posts are considered to be part of the barrier.

This annex is intended to be an informative guideline and not design and construction requirements. If adopted, it will be published outside of the requirements section of the standard M. Leslie noted that there is specific disclaimer language that NSF adds to the end of informational annex to note that the annexes are not meant to be used as requirements for meeting the standard. She will provide the language to M. Perez so it can be added to the annex.

Standard 2 Task Group on Food Shields - Figure 2; 06-17-2011

This figure originally reviewed by the task group in 2011 is from a real project at the University of Wisconsin and has been installed. This example was selected because there are a variety of different types of food shields used. Post positions 20, 21, 22 and 23 denote common post food shields while post positions 1, 2, 3 and 4 are at individual post food shields. Because of the close proximity end shields would not be required at posts 2 and 3 but would be required at posts 1 and 4. This is an example of exception 2 of the *Annex XX End Shield Requirements Criteria.*

The curve of the serving counter at post positions 11 and 13, creates a pie-shaped opening between those posts. So, even though rear posts 10 and 12 are less than 2" apart, front posts 11 and 13 are wider than 2". End shields are required at this location.

Another example is when two differing types of food shields are in close proximity to each other. The food shield at posts 5, 6 and 7 is a vertical food shield. The food shield at posts 8, 9, 10 and 11 is a cafeteria style food shield. Because of the close proximity of posts 7 and 9, end glass is not required at that location. This is an example of an open space in any plane in an adjacent food shield panels not exceeding 2".

Following discussion, the TG decided that a diagram showing the 3 conditions with some description of the example would be helpful.

Roller Grill Requirements (5.35.9) Revisited

Issue Paper FE-2011-5 submitted by Zac Heisler of NEMCO food equipment requests that specific requirements be written for roller grill type equipment. The reason for the request is that a NEMCO customer wanted an NSF certified food shield over roller grill equipment. Due to the height of the rollers on a grill placed on a 36" high counter a food shield is not as protective as intended and prevents safe access to the food. A 12" to 18" tall roller grill placed on a 34" to 36" high counter places the heated rollers nearly at mouth height. With rollers at 48" to 54" above the floor there is a problem with meeting the barrier requirement of 5.35.1.3. Meeting the requirements may make the roller grill dangerous to access because the rollers are hot and in reaching under the food shield a customer could accidentally touch one of the rollers.

Because the rollers heat the surface of the food to a temperature above which bacteria or viral organisms survive, the requirements of 5.35.9 are intended to protect food from contamination dirt and debris from

above instead of from cough or sneeze. As currently written section 5.35.9 provides exemptions from sections 5.351.2, 5.351.3, and 5.351.6.

T. Gagliardi has voiced objections with these requirements from the beginning. Following the last TG meeting where there was a final reading of the language to address this issue paper, T. Gagliardi sent M. Perez an email regarding these requirements. In the same timeframe, M. Perez received an email from B. Harrington and previously from R. Lines both expressing similar concerns about the roller grill requirements.

Copies of these emails were uploaded to the NSF Online Workspace (NOW) on February 12th.

Prior to this teleconference T. McNeil advised M. Perez that he would not be able to participate in today's meeting but expressed that he agrees with T. Gagliardi.

There has been pushback and M. Perez is hesitant to send this language to ballot. The TG is revisiting this issue to see if there can be a reasonable compromise that the TG can support.

T. Gagliardi's main issue is that the language in this section conflicts with most health code requirements because it exempts a roller grill food shield from the barrier requirement. Most food shields service buffets and a roller grill is a self-service buffet. Most guards make it difficult to access food and this is widely recognized. To set something up in the field that 1) complies with the rules and 2) allows access to the food for the customer is often a challenge. T. Gagliardi has found that this is typically a site specific issue due to variations in counters and equipment.

Being able to put up a guard is frequently a challenge and becomes more of a challenge when there is a drawer below the roller grill that acts as a warming space for the holding of hot dog buns. The bun, if unpackaged is an open display for access by the customer when the drawer is opened. Technically, the rules would require a barrier there too. To address this issue, the compromise is to protect the roller grill with a food shield and require the buns to be individually packaged or wrapped so no guard is required because the bun is protected by the wrapper.

T. Gagliardi is concerned that the vast majority of public health officials are going to have a problem with the standard as presented because there is no barrier between the customer and the food. The theory that just by rolling the hot dog on a hot surface will completely disinfect the biological contaminants that may be present on the food product is a simple solution to a more complex process. The challenge is having a piece of equipment that has a guard mounted to it that meets NSF guidelines and installation standards rather than having a free standing or portable guard provided.

K. Smith is not part of this TG and has not seen any part of this draft. As always, any local official having jurisdiction trumps the NSF requirements.

According to T. Gagliardi, the Food Code requires a barrier between the customer and the food. K. Smith is the expert on the federal code. M. Perez noted that NSF standards may not be in violation to the Food Code

and volunteered to do some research and touch base with K. Smith to see what the Food Code says about the barrier requirement. If the proposed language conflicts with the code, there will need to be a different approach to addressing this Issue Paper.

T. McNeil and B. Harrington expressed similar concerns about the proposed language. M. Perez pointed out that if three members of this TG have objections to the proposed language, then it is probable that a third of the Joint Committee that will have issues with the language as presented.

T. Gagliardi points out that if the notion is that you can disinfect, sanitize, or render a biological contaminant inert, then the requirements for any food shield or any end shield is a moot point. If adopted he feels like this may be the first step of several steps in eliminating all guards altogether.

M. Perez pointed out that there is a group of end users and specifiers who are of the opinion that food shields should not be required at all. There is a risk analysis study that is in the works to determine the risks from airborne contaminants from coughing and sneezing. Even if there is scientific evidence that there is no risk of contamination of food from airborne contaminants, M. Perez would still support the requirement for food shields. However, he thinks some requirements could be relaxed to allow for customer access to the food. There is a fundamental issue if there is a conflict with the Food Code. T. Gagliardi noted that the conflict with the Food Code should be confirmed before moving forward and spending more time discussing changes to the standard. He suggests getting an official position feedback from K. Smith from FDA regarding the food shield requirement.

R. Lines' email was reviewed because he had a suggestion that the TG may want to consider. M. Perez read R. Lines' email to the TG. R. Lines described multiple personal experiences with roller grills where the food is not fully heated before allowing customer purchase. That invalidates the assumption the TG made that the surface of the product is so hot, it renders any bacteria or virus on the surface inert. R. Lines made the suggestion that the TG considers the height of the rollers from the floor. Specifying an installation height from the floor can create a certification problem because it is not something a product can be certified to. Whatever requirements are specified in the standard should be things that can be verified during the certification of a particular piece of equipment.

The roller grill does not have legs of its own and typically is place on top of a counter or cabinet at various heights off the floor.

Z. Heisler, the issue proponent, noted that a manufacturer may not know the height of the countertop on which the roller grill will be installed. The problem is that the way the standard is written, the variation in the heights of different countertops, the opening of the roller grill has to be designed with a narrow opening. Z. Heisler is not concerned about requirements for side or back barriers or requirements for the top. His only concern is the distance between the top of the roller the bottom leading edge of the food shield. Typical buffet lines allow for adequate space between the food shield and the food to allow the customers to reach in and gain access to the food. With the height requirement in the issue document, it only allows 5 to 6 inches between the rollers and the guard. After adding a 1 inch product, a pair of tongs, and a customer's arm with a diameter of ~4 inches, there is a risk of burns to the customer.

R. Lines suggested that the problem is not with the food shield requirements but that it is a problem with the way in which the equipment is installed. It is suggested that the food shield of the roller grill meet the requirement of the standard and provide a recommendation for the installed at a specific height. Ensuring that the product is installed at a height higher than manufacturer suggestion is a regulatory function.

M. Perez suggested that a section on roller grills should include some language saying that a food shield above a roller grill shall be in compliance with the appropriate section of the standard. There could be some language for exceptions for end shields and then require a label on the food shield that it be installed on a roller grill or that the roller grill be labeled so that it is installed so that the rollers are no more than 36" above the floor and leave it as a labeling requirement. This is the same approach used for multi-tier food shields and some refrigerators that are made for prepackaged foods only.

Requirements for barriers in regard to mouth height are in 5.31.1.3.

There may be some issues with requiring the label on the food shield instead of the equipment. A customer may be purchasing a roller grill from one company and a food shield from another company so there may be a disconnect with the requirements.

P. Matus offered to provide some examples or criteria for the group to review in future meetings.

The next teleconference will be on March 12, 2013.