

Supplemental Table 1. Retail Assessment Tool Description

Store Characteristics	
Type of Store	<p>The retail assessment tool assessed store type, including grocery store or supermarket, convenience store with or without a gas station, gas station without a convenience store, pharmacy/drug store, liquor store, vape/tobacco shop/head shop, warehouse club/supercenter, or other.</p> <p>To reduce time burden, field staff were instructed not to fill out the “interior” questions of the tool for gas stations without a convenience store (which have a kiosk, but no interior accessible by the public).</p>
Does this location have (either inside or in the parking lot): IQOS Mobile Retail Unit, IQOS Corner, Other IQOS retail services (please describe)	<p>Initial surveillance of IQOS Corners and Mobile Retail Units (MRUs) (described below), which were listed separately from the retail partner stores where they were located, indicated that they would be difficult to find and that they used different marketing and sales techniques from their host retail partner locations. This included selling only IQOS products (no other tobacco or e-cigarette products) as well as having IQOS-specific sales representatives who provided demonstrations of the device and more information to curious customers of legal age. It also included additional marketing attached to the movable trailer/kiosk. IQOS Flagship stores similarly used unique marketing and sales techniques, although they had their own brick and mortar permanent location. Capturing the unique sales techniques and marketing of flagship/mobile/corner stores (referred to here as specialty stores) would require several additional questions in the instrument, only applicable to the specialty stores.</p> <p>Since the schedule for the Corners and MRUs was not posted anywhere and inconsistent, it was impractical to go to these locations an infinite number of times to catch them on location in order to capture data that was not comparable to the other retail locations. Thus, the instrument was designed such that the presence of Corners and MRUs was noted in the question referenced here, then marketing and prices associated exclusively with Corners and MRUs that happened to be located at retail locations were excluded from further analyses.</p>

	<p>IQOS Mobile Retail Units - Small trailers placed in parking lots of some retail partner locations (gas stations, grocery stores, etc.). They were usually on wheels and rolled in and out of the location by being hitched to a car/van. They offered the IQOS device for sale and were always accompanied by IQOS-specific sales representatives who provided information and demonstrations of the device. Since there was no clear schedule for these units, they may not have been present at the location when visited, even if they were listed on the PM website as being there.</p> <p>IQOS Corners - Small stands/kiosks that were located in various areas inside some retail partner locations (gas stations, grocery stores, etc.) and could be easily packed up and moved out of the store. They offered the IQOS device for sale and were always accompanied by IQOS-specific sales representatives (not a gas station/grocery store employee) who provided information and demonstrations of the device. Since there was no clear schedule for these units, they may not have been present at the location when visited, even if they were listed on the PM website as being there. When IQOS Corners were present at the stores assessed, the data collectors were then asked to specify where in the store the Corner was located (at store entrance, at checkout, in front of a tobacco power wall (not within checkout area), or elsewhere in the store).</p> <p>Other IQOS retail services (please describe) - This item allowed data collectors to record previously unseen sales services (if any). Sales services to be noted here were any new strategies that included an IQOS-specific sales representative (not a gas station or grocery store employee).</p>
Product Availability, Accessibility, and Marketing	
<p>Does this store have signage displaying age restrictions (mark all that apply)</p>	<p>The retail assessment tool assessed the presence of signs (professionally produced and/or typed or handwritten) indicating the prohibition of tobacco product sales to persons under a certain age (18, 21, “minors,” or other means of identifying age). Examples include “ID Required,” “We Card,” “We card all customers,” and “We do not sell tobacco products to anyone born after {Year}. You must show proof of age.” The interior and exterior of the store were assessed separately.</p>

<p>Does this store display health warning sign(s) for tobacco products? (mark all that apply)</p>	<p>The retail assessment tool assessed the store for signs that had warning language suggesting that tobacco products were not safe for one's health. This included stand-alone textual or graphic health warning sign(s) or counter-marketing campaigns (e.g., FDA's Every Try Counts, "Never Quit Quitting", etc.); textual or graphic health warning sign(s) that were displayed as part of IQOS ads; and/or textual or graphic health warning sign(s) that were displayed as part of other tobacco product ads. The interior and exterior of the store were assessed separately.</p>
<p>Which types of branded marketing materials are present at the store?</p>	<p>The retail assessment tool assessed both interior and exterior branded marketing materials for IQOS devices/HeatSticks as well as e-cigarettes (including e-juices, pods/cartridges, nicotine salts, and devices) and other tobacco products. To reduce the burden on field staff, we defined "other" tobacco products as cigarettes, smokeless tobacco, or little cigars/cigarillos. The instrument assessed the presence of several different types of marketing for each class of products, including signs, displays, shelving units, and functional items (described below). When IQOS/HeatSticks specific marketing materials were identified, data collectors were asked to count how many marketing units were present. A unit was defined as 1 stand-alone item (looked for borders or gaps between items to determine how many stand-alone items were placed together). The interior and exterior of the store were assessed separately.</p> <ol style="list-style-type: none"> 1. Branded signs were defined as <u>two-dimensional</u> signs (at least as big as a 4x6" post card) with the tobacco company brand insignia, imagery, or font. This does not include on-pack promotions or stickers but does include header displays on shelving units. Traditional signs include paper, cardboard, neon lit, or back-lit materials. Digital signs are those that are displayed on a one-sided LCD screen and often will scroll through multiple ads sometimes for different brands. 2. Branded displays are <u>three-dimensional</u> portable units that can be easily moved. These units may hold or display tobacco products but can also hold other non-tobacco products or may be some other branded three-dimensional, portable marketing product. Traditional displays include multi-sided paper, cardboard, neon lit, or back-lit materials. Digital displays are those that are displayed on a multi-sided LCD screen and often will scroll through multiple ads sometimes for different brands. 3. Branded shelving units are large shelving units or power walls (i.e., rows or columns of tobacco products intentionally lined up or stacked to emphasize the name or logo of the tobacco product). Stacking to emphasize brand

	<p>is defined as at least <u>two rows and two columns</u> of a single brand stacked side by side. These units will have a header display for the tobacco product or brand and are typically affixed to the wall or floor.</p> <p>4. Branded functional items were defined as branded items that serve a functional purpose in addition to promoting or holding a product (i.e., branded welcome mats, trash cans, or shopping baskets).</p>
<p>How would you rate the overall visual impact of the IQOS marketing present at the store?</p>	<p>Data collectors rated their subjective impressions of the visual impact of IQOS/HeatSticks marketing both inside and outside the store. The options were: Free from any IQOS marketing; some IQOS marketing, at checkout only (or only in one area); Some IQOS marketing at checkout and other areas in the store; and IQOS marketing throughout the store (everywhere/in your face). The interior and exterior of the store were assessed separately.</p>
<p>Are there one or more IQOS marketing materials (including customer testimonials) posted at the store that...</p> <ul style="list-style-type: none"> A. Contain references to IQOS as a way to quit smoking cigarettes? B. Suggest IQOS is healthier or improved compared to conventional cigarettes (e.g., “No secondhand smoke” or “No fire, No ash, Less odor”)? C. Suggest IQOS contains healthy ingredients (e.g., organic, natural, vitamins, non-toxic, etc.)? D. Promote IQOS as a cheaper alternative to conventional cigarettes? E. Promote use of IQOS in places where smoking is not allowed? 	<p>The retail assessment tool assessed IQOS/HeatSticks marketing for the presence of certain implicit or explicit health claim messaging for IQOS/HeatSticks both inside and outside the store. Each type of health claim was assessed separately as a yes/no question. This messaging could be on branded signs, displays, shelving units, or functional items and could be graphic or text based. The interior and exterior of the store were assessed separately.</p>
<p>Are there one or more IQOS marketing materials posted at the store that...</p> <ul style="list-style-type: none"> A. Include QR codes or links to websites B. Are placed within 3 feet of the floor 	<p>The retail assessment tool assessed IQOS/HeatSticks marketing for the presence of any materials with QR codes or links to websites (excluding on-pack promotions) and whether any materials were within 3 feet of the floor. This could be branded signs, displays, shelving units, or functional items. The interior and exterior of the store were assessed separately.</p>

<p>Are there one or more IQOS marketing materials posted at the store that feature images of...</p> <ul style="list-style-type: none"> A. Young adult models B. Racial minority models C. Sexual minority models or symbols 	<p>The retail assessment tool assessed IQOS/HeatSticks marketing for the presence of images or symbols (i.e., photos, drawings, cartoons, etc.) of young adults, racial minorities, and/ or sexual minorities. This could be on branded signs, displays, shelving units, or functional items. The interior and exterior of the store were assessed separately.</p>
<p>Are there one or more IQOS marketing materials posted at the store that...</p> <ul style="list-style-type: none"> A. Promote a customer loyalty program B. Advertise IQOS promotional events 	<p>The retail assessment tool assessed IQOS/HeatSticks marketing for promotion of a customer loyalty program or an IQOS/HeatSticks promotional event. An IQOS customer loyalty program would be one that offers discounts or free gifts/points for customers who join the IQOS family. A promotional event for IQOS/HeatSticks would include events in the store or community that were sponsored by IQOS or that promote IQOS use. The interior and exterior of the store were assessed separately.</p>
<p>Are any IQOS temporary price promotions visible on marketing at the store?</p>	<p>The retail assessment tool assessed different types of IQOS price promotions visible for 4 products (IQOS device kits, IQOS device bundles, Marlboro HeatSticks packs, and Marlboro HeatSticks cartons) on the interior and exterior of the stores. A price promotion is a temporary discount (time-limited) that may entice people to “buy now.” The types of price promotions assessed included multi-pack discounts (a discounted price when you buy more than one item), cents/dollars off coupons, special price (a time limited discount that is applied no matter how many items you purchase), gift with purchase, and mail-in coupons/points towards merchandise. This does not include every day prices associated with free membership cards. The interior and exterior of the store were assessed separately.</p>
<p>Are other tobacco devices or products sold?</p>	<p>The retail assessment tool assessed whether the stores sold other tobacco products, including e-cigarette products (including e-cigarette devices, cartridges, pods, e-juices, and nicotine salts), cigarettes, smokeless tobacco products, and little cigars/cigarillos. No was selected if there was visual, textual or verbal confirmation that a product was not sold and unsure or not visible was selected if the product was simply not visible in the store. If the product was visibly sold in the store, then data collectors selected between visible and self-service (if the product can be accessed by the customer without any help from a clerk) or visible but not readily accessible by customers.</p>
<p>Are IQOS products (IQOS device or Marlboro HeatSticks) sold?</p>	<p>The retail assessment tool assessed the availability of IQOS devices and/or HeatSticks at each store. Although retail locations were listed as only selling HeatSticks at the time of assessment, availability and accessibility of IQOS</p>

	<p>products were still evolving, thus we assessed availability and accessibility of both IQOS and HeatSticks at retail locations. Availability was confirmed visually. The option to select “Yes, but only at an IQOS Corner or IQOS Mobile Unit” was included to avoid confusion by data collectors but had no further use. If the product was sold in the store, then data collectors selected between visible and self-service (if the product can be accessed by the customer without any help from a clerk) or visible but not readily accessible by customers. If the product was self-service, then data collectors specified whether the product was on the counter by checkout, on the wall by checkout, or at another self-service location.</p>
<p>Inside the store, are there any IQOS products (device, HeatSticks, or accessories) within 12 inches of toys, candy, gum, slushy/soda machines, or ice cream?</p>	<p>The retail assessment tool assessed whether any IQOS/HeatSticks products were placed within 12 inches of toys, candy, gum, slushy/soda machines or ice cream.</p>
<p>Are IQOS device components or accessories (IQOS cleaner, power adapter, USB cable, cleaning sticks, carry cases, etc.) sold separately?</p>	<p>The retail assessment tool assessed whether any IQOS device components or accessories were sold separately from a device kit. This included IQOS branded cleaners, power adapters, USB cables, cleaning sticks, and carry cases.</p>
<p>What (if any) flavors of IQOS HeatSticks are sold? (mark all that apply)</p>	<p>The retail assessment tool assessed the available flavors of HeatSticks by the pack and carton in the store among the flavors legally authorized for sale (tobacco, smooth menthol, fresh menthol). There was also a category of “other” where data collectors could note whether any additional flavors were sold and specify the type of flavor.</p>
Price	
<p>IQOS/HeatSticks and cigarette prices:</p>	<p>The retail assessment tool recorded the price of the IQOS device kit, IQOS device bundle, Marlboro HeatSticks pack, Marlboro HeatSticks carton, and Marlboro Red cigarettes pack, where available. The data collectors recorded the lowest price per unit available (including discounts and membership cards). The recorded price included state and federal excise tax, which is already included in the sticker price, but did not include sales tax. Any discounts included in the price provided were noted and described. The price was obtained either by interacting with the cashier or by observing an advertised price. Because of COVID-19 concerns, data collectors were not required to speak to a store clerk to obtain the prices. Thus, some prices were obtained from posted prices, while others were obtained</p>

	<p>from cashiers or price-check scans of the item. Data collectors were all of legal purchasing age (21+) but did not buy any tobacco products as part of the assessment.</p>
Discrepancy Reconciliation Plan	<p>Where one data collector leaves a question blank, the other person's answer will be used. Disagreements about the presence or absence of a feature will be reconciled using the affirmative answer. Differences in counting items will be reconciled using the higher number. Disagreements in price will be reconciled using the average of the two prices.</p>