

## *Resource list for 3/16/22 Camano Wildlife Habitat Program*

### ***"Birds and Glass Don't Mix – Protecting Birds from Window Collisions" by Hanae Bettencourt, Seattle Audubon***

- Window Collision Prevention Method Comparison Chart (see below)
- [Bird's Eye View window decals](#) – These are the ones I was referring to regarding the harder-to-reach upper story windows. These can be placed in the inside of the window. I don't have any experience with these, but they would probably be better than nothing. (The American Bird Conservancy has determined that their [success rate](#) is variable.)
- We have a [good page](#) on our website that refers to most of what I spoke about last night. I've added the window collision prevention comparison chart (the "menu") as a link in the right side bar as well.
- Wind turbines – Here is the [US Fish and Wildlife's data](#) on threats to migratory birds. It shows median deaths related to cats, windows, cars, wind turbines, and more. It does show that wind turbines cause relatively few deaths compared to others. What I find interesting is that the Habitat Loss section is listed as "N/A." I wonder what these numbers would look like if that was taken into account in some way...
- [Seattle Audubon Nature Shop](#) – several of the methods I mentioned are available on our online shop. Purchasing from Seattle Audubon instead of Amazon would help support us and the conservation work that we do. Thanks!
- Here's some more info on [Robins](#) and their specific beef with windows.



## Window Collision Prevention Methods Comparison Chart

Window strikes are one of the biggest hazards to urban birds. As a majority of window strikes in the city happen on residential buildings, it is important that all homeowners take measures to make their windows bird-safe. The chart below outlines all of the different techniques that one can use, from economical but non-permanent DIY options, to more permanent professionally installed systems, as well as many options in between. It is our hope that everyone will be able to find an option that works for them.

**DIY Anti-collision methods:** These are methods that can all be done at home with simple materials you already have or can purchase in The Nature Shop or a local hardware store. Note: All methods listed below are to be installed on the OUTSIDES of the windows on your home.

Anti-Collision Method	Price*/ 16 sq. ft of glass	Ease of DIY project* and time	Other Materials needed?	Visual Disturbance* (1=low to none, 5=high)	Permanence	Efficacy*	Notes
<b>DIY Glue Decals</b>	\$12-\$15 for school glue, food coloring, and dish soap (can cover many windows)	Very Easy, 4-6 hours (mostly drying time)	clear plastic sheets (like produce clamshells), cotton swabs or paintbrushes	4 (if applied in a manner that is best for collision prevention)	Not permanent, will wash off if it gets rained on. Even if kept dry, the color fades over time.	Important to make enough decals to cover the whole window without leaving large amounts of space.	A very fun project for children. Will leave streaks on windows if they get wet, but they are easily washed off.
<b>Soap Drawings</b>	\$3-\$6 (for one bar of soap, which will cover all windows of a house)	Very easy, 5-20 minutes, depending on pattern chosen	None	3-4 (depending on design)	Not permanent, will wash off if it gets rained on.	Effective, as long as coverage is adequate.	Soap can leave streaks on windows if they get wet. Lots of freedom to create fun, seasonal patterns.
<b>White Window Marker Lines</b>	\$3-\$10 for one marker, which will cover several large windows	Easy, 15-30 minutes	Ruler or straight edge to help draw straight lines	3-4 (depending on width)	Quite permanent if using oil-based marker. Can be washed off easily with soap and water	Effective, as long as coverage is adequate.	Straight lines can be hard to draw, but this is a very economical option.
<b>WindowAlert Decals</b>	\$39.90 (for two, 3-packs)	Very Easy, 5-10 minutes	None	4 (when applied on a manner consistent with maximum collision prevention)	Likely to last longer than manufacturer recommended 6-9 months. Easily removed, no residue.	Effective, as long as coverage is adequate. (Must use more than package instructions state.)	Fun option with many different styles and shapes. Cling to windows better in warmer weather.

<b>WindowAlert Decals with WindowAlert UV marker</b>	\$19.95 + \$19.95=\$39.90 (3-pack of decals plus one bottle of UV liquid)	Very Easy, 5-10 minutes	None (UV flashlight may help to determine if reapplication is needed.)	2-3	Manufacturer recommends replacement every 6-9 months. Likely will last much longer. UV liquid may need to be reapplied as often as every 3 months.	Variable. Not all birds see UV, and some evidence shows UV methods have less effect in low-sun, or overcast conditions.	More economical option that maximizes outside viewing, plus the bottle of UV liquid can cover more windows
<b>WindowAlert UV Liquid Blotter</b>	\$19.95	Very Easy, 5-10 minutes	None (UV flashlight may help to determine if reapplication is needed.)	1	Reapply every 3 months or as needed due to fading. Can be washed off window with an ammonia-based window cleaner (Windex).	Variable. Not all birds see UV, and some evidence shows UV methods have less effect in low-sun, or overcast conditions.	One bottle can cover a lot more than 16sq. ft. Once dried, nearly invisible.
<b>Feather Friendly Window Tape</b>	\$19.95/roll	Medium, 30-45 minutes	Pencil, ruler, scissors	2	Lasts as long as you need it to, though frequent window washing may peel some of the dots off. Dots come off like a sticker, no residue.	Effective, when placed in 2"x2" pattern.	Great option that last a long time and doesn't obstruct outside viewing of window.
<b>CollidEscape Tape</b>	\$21.95/roll	Easy, 15-20 minutes	Pencil, ruler, scissors	3 (white) or 2 (clear)	Lasts as long as you need it to. Can be removed easily.	Very effective, when applied with less than 4" vertical gaps.	Can be conspicuous, as tape is quite thick. The Clear tape has less visual disturbance.
<b>DIY Paracord Installation</b>	\$5-\$10 for materials that will cover several windows	Easy/Medium, 20-30 minutes per window	Electric drill, screws, scissors, pencil, ruler	2-3	Lasts as long as you need it to. Can be removed easily.	Very effective, when applied with less than 4" gaps.	Works best for windows that are 4' or less in height. Longer cords can tangle in the wind more easily.

\*Price, ease of installation, visual disturbance, and level of efficacy can depend on many factors, including personal preference, skill of self-installer, environmental conditions, location of window, etc. It is important to consider all personal factors when making a decision.

**Ready-to-install or Commercial methods:** The following methods are available in a state that are ready to install on residential windows, or, in some cases, can be installed by a professional. Self-install difficulty can range from easy to difficult, and professional installation availability may be limited. This is not an exhaustive list of collision deterrent options. See QR code at the bottom of this list for more info.

Anti-Collision Method	Price/16 sq. ft of window	Website QR Code	Self-install or professional? / Level of difficulty	Visual Disturbance*** (1=low to none, 5=high)	Permanence	Efficacy	Notes
Acopian Bird Savers	\$65 (for window 46" to 51" wide)		Self-install - Medium	3	Long-lasting, though removable	Very effective, when applied with less than 4" gaps.	There are several different mounting options to choose from.
Bird Screen	\$23-\$27 per window		Self-install - Medium	2	Long-lasting, easily removable, 1-year warranty	Very effective, as it covers the whole window, leaving no gaps.	Installed with suction cups. Options available for sliding glass doors and custom sizes.
CollidEscape 2x2	\$74 (10'x16" roll)		Self-install - Medium/Hard	2	Rated for 10-year lifespan though removable	Effective, as the dots are spaced at 2"x2"	The look is similar to Feather Friendly, but this option has clear film between the dots.
CollidEscape Guaranteed Window Coverings	\$52-\$69 per window		Self-install - Medium/Hard	4	Rated for 10-year lifespan though removable	Very effective, as it leaves no gaps on the window.	<a href="https://www.collidescape.org/installation-instructions">https://www.collidescape.org/installation-instructions</a>

<b>Feather Friendly Commercial</b>	Varies, call for a quote		Professional	2	Long-lasting, can be removed, several different design options.	Varied, depending on design choice. All are relatively effective, options with a 2"x2" spacing are best.	Can be professionally installed on residential homes with harder-to-reach windows.
<b>Solyx Bird Safety Films</b>	Varies, comes in 48"-58" rolls, runs from \$26.52-\$32.61/running foot		Self-install - Medium/Hard or contract with install partners	2-4 depending on style	Long-lasting, 7-year warranty, removable	Very effective	Can order 5"x7" samples of all their designs. Likely will need professional installation.
<b>Bird Crash Preventer (Fishing line system)</b>	\$29.95 (48" wide)		Self-install	1-2, almost invisible	Can be removed, line may need to be tightened over time as it can stretch.	Variable. Fishing line can be hard to see, especially in low-light or overcast conditions.	Can be a DIY option.
<b>Walker Glass</b>	Varies, call for a quote		professional, old window must be replaced	varies	modified glass - permanent	Company offers UV and acid-etched options. Acid-etched rated at higher efficacy than UV.	This option is best when shopping for windows for a new construction or when replacing older windows

*Want more?* The American Bird Conservancy has done extensive research on all of the bird-safe window treatment options available and organized their conclusions into a **Glass Collisions Products and Solutions Database**. All of the options listed in this comparison guide are included in the database.

The products and solutions listed are organized by "threat factor," a rating system that indicates the effectiveness of each method in preventing collisions. Click on the QR code to the right to access the database, or visit

<https://abcbirds.org/glass-collisions/products-database/>.

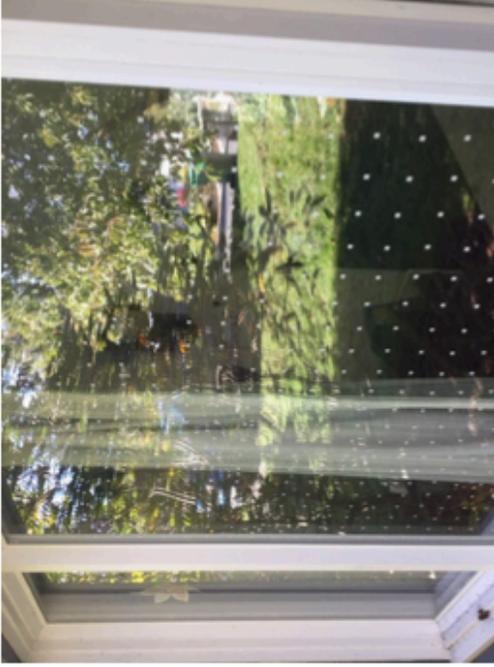
**Other Options:** Some window treatments, while not explicitly utilized for bird window-strike prevention, can also be useful in this realm. The options below are first and foremost for aesthetics or utility, but also have the secondary benefit of making a window bird-safe.



Anti-collision method	Price/ 16 sq. ft of window	Website QR Code	Self-install or professional?	Visual Disturbance (1=low to none, 5=high)	Permanence	Efficacy	Notes
Stained Glass	Varies	Many options	Professional	5	Quite permanent, and likely not easily removable, depending on size of piece.	Very effective, as long as no additional "storm windows" are applied on the exterior.	Beautiful, but with high visual disturbance.
External Insect Screens	Dependent on number of windows		Professional	2	Many homes have them up permanently, but can be removed.	Very effective	General window screens are one of the best bird-safe measures one can use.
Exterior Sun Shades	\$98.90 (48"x48" window)		Self	2	Can be put up long-term and taken down easily	Very effective	Suction cup attachments



Hand-drawn Soap Design



Feather Friendly Window Tape



DIY Paracord Acopian Bird Savers



CollidEscape Tape (Clear)



DIY Glue Decals



WindowAlertDecals