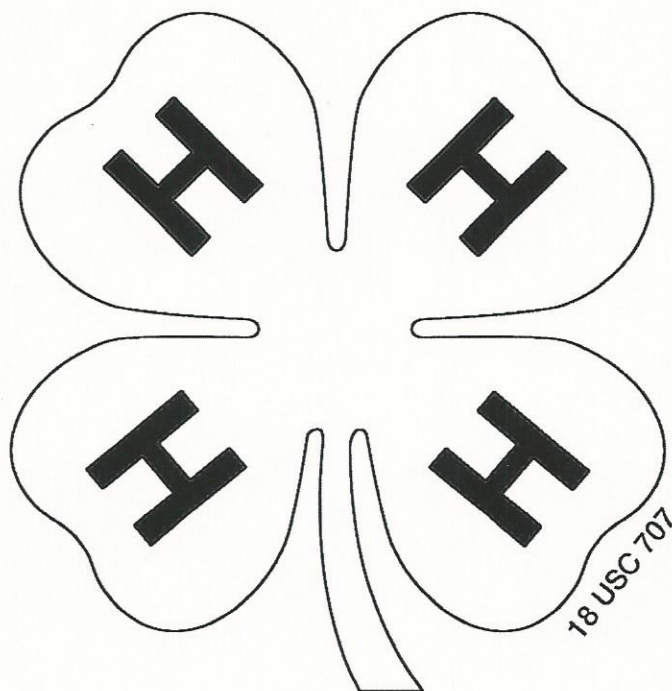


4-H Litter Officer



Name of Litter Officer _____

Year _____ Age as of January 1 _____

County _____

Name of Club _____

4-H Advisor Signature _____



THE OHIO STATE UNIVERSITY
COLLEGE OF FOOD, AGRICULTURAL,
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The inside pages of this cover are your club score sheets in the litter control achievement program. Write the number of members who take part in any activity. Activities include learning about litter (Knowing It), sharing your knowl-

edge with others (Telling It) and helping picking-up, cleaning-up and recycling in Ohio (Doing It). Activity guides for selected activities are included in this packet.

At the end of the summer, turn these sheets in to your

county Extension agent. So do a good job! Try to complete activities from each of the three sections. Your club has to do only one activity and turn in this score sheet to achieve a club participation certificate. Record each activity only one time.

Knowing It

This section involves you and your club in projects that discover information about litter, litter control or recycling. For help or ideas of possible activities, see your club vice-president or your advisor. When your club completes a "Knowing It" activity, record it in Column A, your county Extension office will fill in the remaining columns.

	A	B	C	
Activity <i>See Activity Guides #1 and #2</i>	Number of Members Who Took Part	% of club participating (A + Club x 100)	Value Total	Total (B X C)
Viewed a film, slide set or film strip on litter or recycling at our club meeting			1	
Invited a speaker to our club meeting			1	
Read a book or article on litter or recycling			1	
Sponsored a field trip to a recycling facility			1	
Listed the places or groups in our area that accept items for recycling			1	
Completed a "Walking Tour" and identified littered areas in our community. Our list is attached. (See Activity 3.)			2	
Completed a community "garbage" fact sheet. It is attached. (See Activity 4.)			3	
Completed an Informal Roadside Litter Survey. It is attached. (See Activity 5.)			5	
Other educational activities What?			*	
Total this page				

*Your County Extension Agent, 4-H, will assign a value based on the value of similar activities.

Activity 1

Your Litter Project

Early in the year, your club needs to discuss the litter project. Take about half an hour to an hour and try this:

1. Talk about litter. What it is, what it costs, etc. Use the "Litter" known facts sheet on page ?.
2. Discuss what your club could do to learn about litter (Knowing It), tell other about the litter problem (Telling It) and help clean up your community (Doing It). Read the ideas suggested on the record booklet. Ask if anyone has other ideas.

3. If you have high school age members in your club, you might have them lead the club in discussing possible litter activities or you could have everyone share ideas and choose some in each area (knowing, telling, doing).

4. Decide what to do and in what order. It's better to choose only a few ideas and do them. Then, if your club has time, choose a few more.

5. Develop a detailed plan of action for carrying

out each project selected. Such plans must include the who, what, when, where and how of each project undertaken.

6. Carry out your plans.
7. Let others in your community know what your 4-H club has done to help.

On some projects, it might be good to talk to your mayor, township trustees, county commissioners, or county engineer about your ideas. They can let you know what you need to do and help you get started.



Discussion Sheet

What (Project Selected)	Who (Will Help)	When (Will We Do It)	Where (Will We Meet)	How Will We Do It What Will We Need

Activity 2

Fascinating Facts for Litter Control

Ohio homes and businesses discard over 1 million tons of waste each year.

- ✓ That is more than one ton per person per year!
- ✓ The average American discards about four pounds of household waste each day.
- ✓ The average office worker has around 1.6 pounds of trash each day.

The federal government spent \$67.7 million picking up litter from federal highways in 1980.

- ✓ In Ohio, the same year, \$1,103,931 was spent on litter from state highways.
- ✓ In Massachusetts, the same year, \$1,861,000 was spent on litter clean-up.
- ✓ Ohio spends more than \$50 million to clean-up "public" litter each year. This does not include the costs for cleaning sport stadiums, movie theaters and other private litter.

- ✓ In 1981 it cost \$25 per mile to clean-up litter.

Accumulated litter along state highways (not including federal, county, city or township roads):

- ✓ 10,950 tons or 199 pounds per mile.
- ✓ 200 million pieces* or 1,815 pieces per mile.

Fresh litter:

- ✓ 1,247 tons per week or 23 pounds per mile per week.
- ✓ 18 million pieces* per week of 165 pieces per mile per week.
- ✓ More than 8,500 pieces per mile in one year!
- ✓ By weight, the largest category of fresh litter is glass.
- ✓ By count, the largest category of fresh litter is paper.

If every person in Ohio said, "just one pop bottle won't hurt anything..." and

dropped one bottle this year:

- ✓ There would be 10,797,419 pop bottles.
- ✓ There would be 5,398,709.5 pounds of empty bottles (16 oz size) which is equal to 675 full grown elephants (by weight).

If every person in Ohio dropped one gum wrapper on the ground this year, the wrappers would, put end-to-end, be 447.3 miles long. That is enough to go from Cleveland to Cincinnati and back.

Why do people litter? A study on attitudes about litter in Ohio shows these reasons:

- ✓ They do not think they will get caught.
- ✓ They do not care about the landscape.
- ✓ They feel "someone's paid to pick it up."
- ✓ There is already trash there.

* A piece is any item larger than a cigarette package.

✓ "Everybody does it."

✓ They feel what they do is not littering.

Littering is a conscious act. It is the attitude about litter that has to change before people will change their actions.

There are seven major sources of litter: 1) pedestrian, 2) motorist, 3) uncovered trucks, 4) loading docks, 5) improperly protected household refuse, 6) improperly protected business/industry refuse and 7) construction sites.

What happens to litter? Some of it biodegrades, that is it eventually breaks down and becomes a part of the environment.

✓ A tin can will biodegrade in about 100 years.

✓ An aluminum can stays around for 500 years.

✓ The disintegration time for glass bottles is unknown.

There are 55 laws in 24 states restricting or controlling sales of potential litter materials (i.e. deposits, pull tab rings, "litter" tax, etc.)

Recycle means returning a product back to the process by which it was first formed.

✓ Recycled newsprint is made into corrugated cardboard and egg cartons among other things.

✓ Some uses for recycled

plastic soda bottles are carpet backing, fiberglass for clothing and rope.

One tree can make 118 pounds of newspaper. The Sunday edition of the Columbus Dispatch weighs approximately 2.25 pounds and has a circulation of around 340,000.

✓ That is 765,000 pounds of paper.

✓ 6,483 trees EVERY SUNDAY!

✓ Three million tons (6 billion pounds) of newsprint is recycled each year.

✓ Only 25 percent of the newspaper in the United States is recycled.



Activity 3

A Walking Tour

A walking tour is a chance to see firsthand the various types of litter and where

they come from. The tour involves going through different parts of your commu-

nity, noting what litter you see, where you see it and what source left it there.

Sources of Litter

Pedestrian -- Litter dropped by people walking in or through the area

Motorist -- Litter thrown from cars

Open Trucks -- Litter blown off uncovered trucks

Commercial Refuse -- Trash from business waste receptacles

Household Refuse -- Litter from improperly covered household trash cans

Loading/Unloading -- Litter blown from docks while trucks are being loaded and unloaded

Construction -- Trash from construction projects

Types of Litter

Paper -- Any paper products

Cloth, clothing -- Discarded rags, etc.
Meal Cans, pop can tabs, etc.

Plastics -- Jugs, pieces of plastic, etc.

Styrofoam -- Glasses, foam boxes, fast food, etc.

Glass -- Bottles, pieces of glass

Rubber -- Tires, toys

Miscellaneous -- Litter that doesn't fit into any of the above groups



How To Do It

1. Your club can go in one large group or you can divide into smaller ones. If you are in smaller groups, assign each one a section of the community to walk through; if your club stays together, decide where your walk will be.

2. Walk! Look for litter and take notes. Decide where the litter came from (source) and what type of litter it is. Write those ideas down along with where the litter was seen (corner of building, sidewalk, parking lot, gutter, alley, etc.)

3. When everyone is back together again, talk about what everyone saw. Determine if a pattern is there: are there certain types of trash only in certain areas? Is the source different in different areas? etc.

If your club is planning a walking tour, keep these ideas in mind:

1. Dress according to the weather.
2. Take paper and pencils. (Don't leave them anywhere!)
3. Be prepared to talk about what you will see!

Activity 4

Garbage Fact Sheet

How much "garbage" does your community throw away? How much does it cost and where does it go? The following questions will

help you find this out. Once you have the answers, you may wish to write an article for your local newspaper on what you have found.

1. What is the population of your community (town, township, city, etc.)? _____

Name of town, township or county _____

How many families are there in the community? (See census data at your local library). _____

Average size of family (population of community divided by number of families). _____

2. How many tons of garbage does our community dispose of each day? _____
each week? _____

(This information may be obtained through the local Department of Public Works, the Department of Sanitation, the County Commissioners' office, Township Trustees, the landfill operator or the collection hauling company)

3. Does this amount really show how much garbage our community generates or is some of it burned, dumped in open dumps or taken directly to the landfill by local residents? (Which if any) _____

4. Where is our city or county sanitary landfill? _____

What is the charge to use it? _____

5. How many pounds of waste are disposed of by each person in our community every day? _____

(Multiply tons per day - see question number 2 by 2,000. Divide the total by the number of people in the community, question number 1)

How many pounds per person per week? _____

How many pounds per family every day? _____

How many pounds per person each week? _____

How many pounds per person each year? _____

(Multiply pounds per person per day by 365)

6. How much does it cost to dispose of the waste per ton?

(Collection transportation costs plus landfill fee) _____

7. Is there a recycling center in your town or community? If not, where is the nearest one? _____

Who runs it? _____



Activity 5

Informal Roadside Litter Survey

Measure how much litter there is in your community. Follow these basic steps:

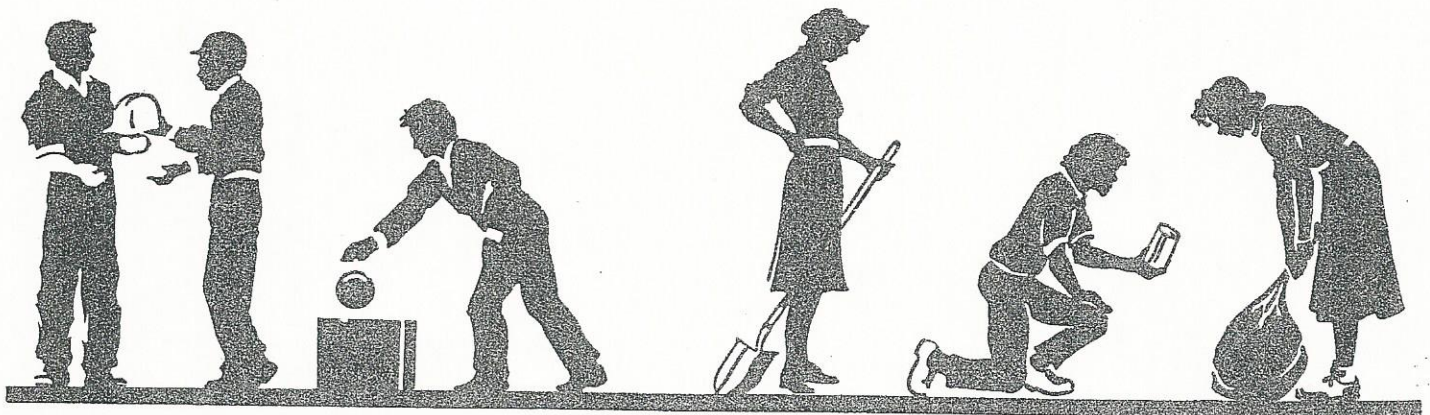
1. Choose the area you want to survey. It may be only a rural road, a state highway, a residential area, a business district or a combination of them all.
2. Determine which roads you will survey. Use at least three. If it's a combination, do at least two for each of the areas you will be studying. The roads should not be next to each other or intersect near the points of the study.
3. Prepare a survey sheet for the area you are going to examine. You can use the attached sheet or make your own.
4. Using a measuring tape or a yardstick, mark off 20 feet from the curb intersection (A). Starting at that mark, measure 52 feet, 9 inches along the road (B). Mark this. Measure 10 feet behind the berm or curb on both sides of the road (C). Between these points is your survey field.
5. Using plastic or metal buckets, gather all the trash within the survey field. Do not go beyond the survey area or onto the road.
6. Separate the trash into separate piles of cans, bottles, paper, fast food containers, etc. Count all the pieces of trash you have gathered and record the information.
7. Do steps 4, 5 and 6 for each area to be surveyed.
8. Total the number of cans, bottles, etc.

9. Divide the total of each column by the number of areas you surveyed. (That should be three or more)

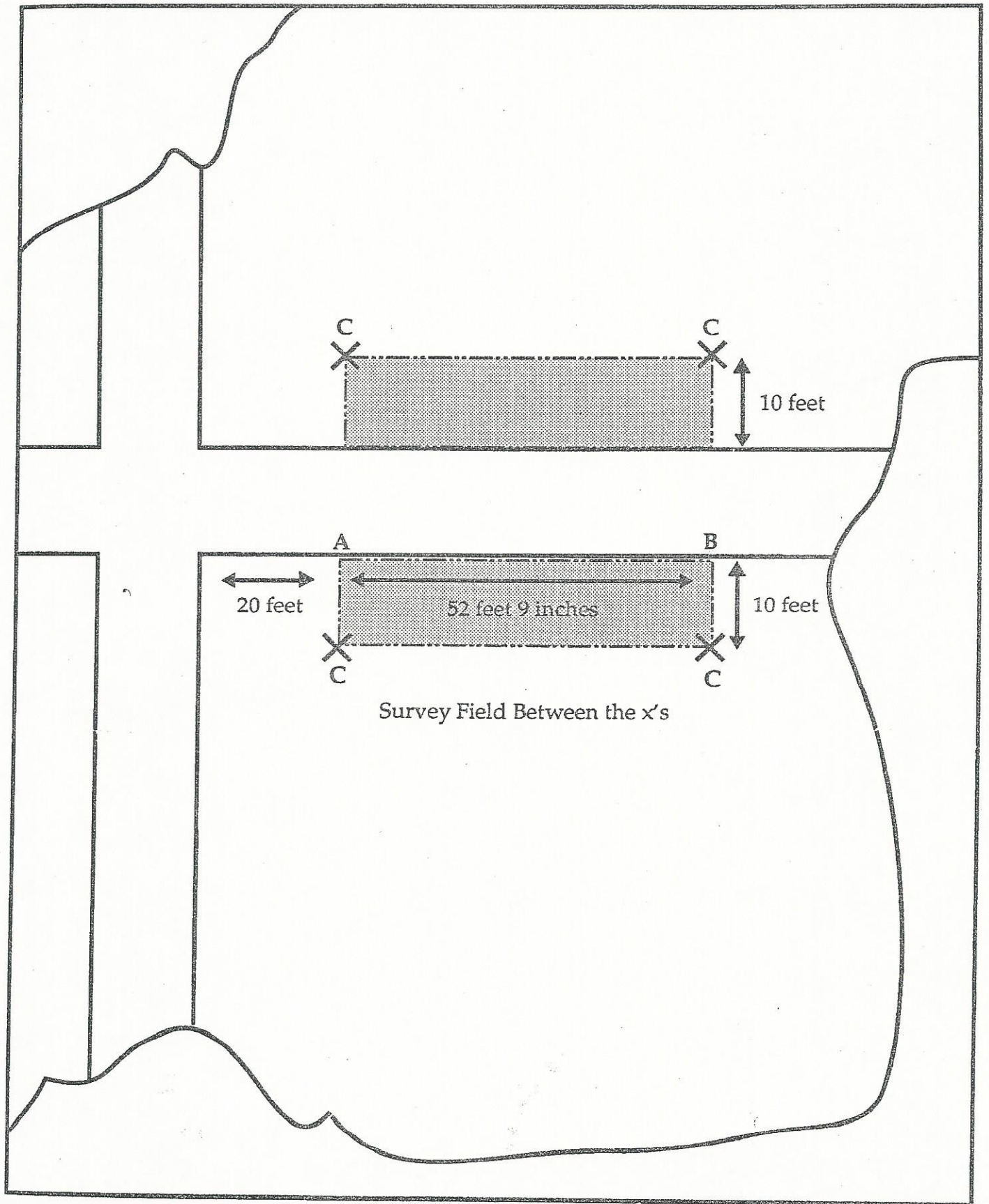
10. Multiply each answer by 100.

This is an approximate average of how many pieces of trash (litter) there are per mile in the area you surveyed.

Decide with your advisor how to distribute the results. You may wish to send them to your mayor, city councilman or township trustee. You might even want to prepare a report for your local newspaper. Be sure you state where you took the survey, when you did it, who you are (your 4-H club), why you did it (to see if your community need to be more aware of litter, to see how severe the litter problem is, etc.) and what can be done about it.

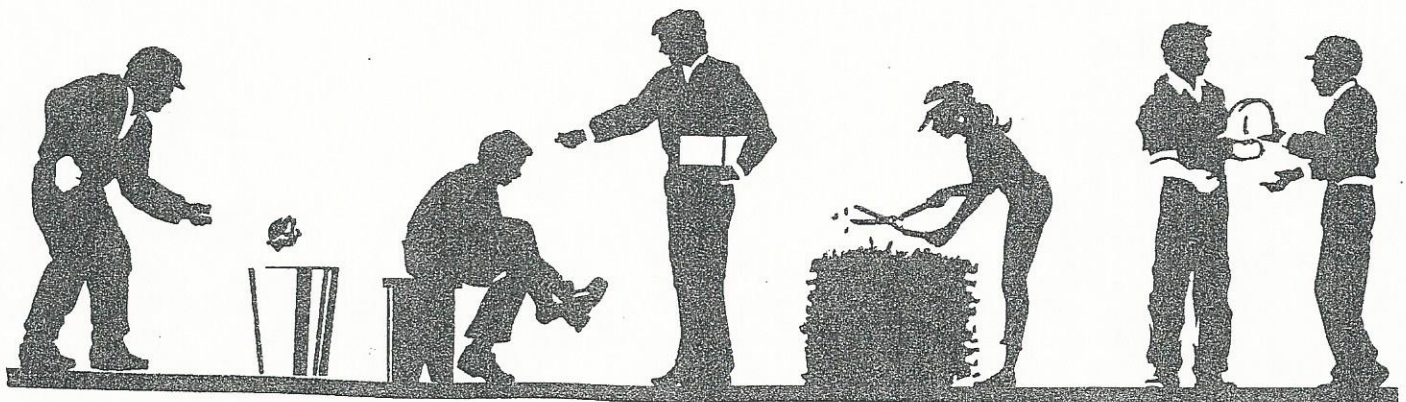


Setting Up A Survey Site



Safety Procedures to Follow

1. Contact local officials.
 - a. Determine a location. Depending on where the road is located, this could be the township trustees, county highway department or county engineer, Ohio Department of Highways, mayor or street department, sheriff, local police or the Ohio Highway Patrol. These officials can advise and assist you in planning and carrying out a safe project.
 - b. Discuss safety procedures. Do the local officials suggest a car follow each group with hazard lights? Do they have special "crew working" signs to put on each road? Do they have safety vests for your club to wear? It might be good for everyone to wear gloves.
2. Before you are ready, make sure everything is definite and nothing is left to chance.
 - a. The adult responsible for the activity may want to have each participant, or parent or guardian of a participant, sign a written waiver or release form prior to the project. A letter to the parents or guardians explaining the project is also suggested. See Activity 7.
 - b. The adults responsible for the activity may wish to carry a first aid kit with them for any minor injuries.
3. You may want to consider short-term activity insurance. This is typically available for 15 to 20 cents per person per day. For information see your county 4-H agent.



Informal Roadside Litter Survey Sheet

Survey Area	Cans	Bottles	Pieces of Paper	Fast Food bags, cups, hold- ers, etc.	Large Trash boxes, mufflers, tires, etc.	Small Trash pop can tabs, bottle caps, etc.
1						
2						
3						
etc.						
Subtotal Divide by the number of areas surveyed						
Total Times 100	$\frac{\text{Total}}{100}$	$\frac{\text{Total}}{100}$	$\frac{\text{Total}}{100}$	$\frac{\text{Total}}{100}$	$\frac{\text{Total}}{100}$	$\frac{\text{Total}}{100}$
Average Pieces Per Mile						

Activity 6

One of the best ways of sharing information is by talking, anything from giving a formal speech to a casual conversation with friends. In the following activities, your club can earn points for doing "Litter Talk."

To My Club

A short talk or report on a litter subject can be given by members of your club to the rest of the club. A two-minute report on local litter events, recycling centers or a talk on something they read is fine. The idea is for each person to share information that the rest of the club might not know. Perhaps a different person could give a talk at each club meeting!

To Other 4-H Clubs

This is a little harder because the talk will be much more difficult to give to other groups. (See hints). Everyone knows 4-H'ers in other clubs and these 4-H'ers can have their advisors set up dates and times for you to speak to their clubs.

Litter Talks

Other Public Talks

Service and social groups in your community are always looking for "guest speakers." If a club member has a good talk and does it well, talking to these other groups might be a way to "spread the word" on litter control and recycling or a possible way to get support for a specific activity your club is doing.

Scouts, Rotary, church groups, Lions or any local group is a potential audience.

County Speaking Contest

This is a speaking contest that is set up by the county. Not all counties have this competition. Talk to your 4-H agent. Your agent will also give you guidelines for the contest if your county has one.

Hints For Your Talks

1. Make a list of things relating to litter or recycling. Now look at the list. What are some ideas you know something about or you would like to learn? Choose one idea — that is your topic.
2. Find out more about your subject. Talk to knowledgeable people. Read. Anything related to your subject can give you a better understanding of what you will talk about.
3. Write the three most important points (ideas) you want to get across. This will be the main part of your talk (the body). Connect the points with related ideas.
4. You will need an introduction. A good way to start is with an attention-getter: a quotation, a statistic, a humorous (but related) story or a recent event are all good. After you have their attention, you should very briefly tell the audience what you will be speaking about.
5. Follow the introduction with the body of your talk. Make each point and then follow it with extra information. Try to let the ideas flow like natural conversation.
6. Finally you need a conclusion. This should briefly summarize your talk and end with something to think about.
7. Don't forget to practice! The more you practice, the easier it will be to talk and the better you will do.
8. Most important of all, smile.

Activity 7

Clean Up Campaigns

Roadside and Site Clean Ups

Planning

1. *Decide on a "target area"*

For roadside clean-ups:

Decide on the area your club will be cleaning-up and how much time it will take. Plan on three younger club members and one older member, junior leader or advisor (adult) per group. An hour per mile is an average time to do a good job — and one mile per group could be enough! Try to do one concentrated area rather than scattered areas. Avoid pick-up projects along busy highways such as state routes and interstate highways.

For site clean-ups:

Some examples of site clean-up projects are: a park, a playground or an empty lot.

2. **Set a tentative date and time** but also have a "rain date." Be sure enough club members and adults (advisors) are able to make both dates to guarantee a successful clean-up.
3. **Determine equipment you will need:** plastic buckets for everyone are helpful as are large tough plastic trash bags and pick-up trucks.
4. **Contact local officials.** For roadside projects: Decide whether the road is maintained by the township, county, municipality or the State. This is usually marked on the road sign giving the name or number of the road.

If a:	Contact
Township Road	The local township trustees or road maintenance personnel
County Road	The County Engineers Office
Village or City Street	The mayor or street department
State Highway	The regional office of the Ohio Department of Transportation

These officials can advise and assist you in planning and carrying out a safe project. You may also want to contact the local police, county sheriff or the Ohio Highway Patrol for safety assistance.

For site projects: Determine who owns the site. This could be city, township, county, state or privately owned property. Your club will need to get permission to clean the area.

5. **Discuss safety procedures:** Do the local officials suggest a car follow each group with hazard lights? Do they have special "crew working" signs to put on each road? Do they have safety vests for your club to wear? Do local officials have guidelines to follow or perhaps if the site is especially bad, do they want some of their own personnel to help you? They may have special equipment you can use. Attempt to get safety equipment locally. If you cannot, you might contact the Office of Litter Control, The Ohio Depart-

ment of Natural Resources, Fountain Square, Columbus, OH 43224.

6. **Disposal.** Be sure you know where you can legally and safely dispose of the collected trash. Arrange for passes or payment to the landfill. Recycle what you can.
7. **Before the clean-up campaigns, check to be sure everything is definite and nothing is left to chance.**

The adult responsible for the activity may want to have each participant, or parent or guardian of a participant to sign a written liability waiver or release form prior to the project (example attached). A letter to the parents or guardians explaining the project is also suggested.

The adults responsible for the activity may wish to carry a first aid kit with them for any minor injuries.

8. **You may want to consider short-term activity insurance.** This is typically available for 15 to 20 cents per person per day. For information see your county 4-H agent.

Pick-Up

Everyone should meet at the agreed time and place. All should wear light, bright colors, with long sleeves, long pants, socks and work shoes, boots or heavy soled shoes. No one should have open-toed shoes or sandals. Gloves are recommended. (Remember, there is a lot of broken glass out there. Gloves and shoes will keep you safe!)

Roadside

Agree upon pick-up times and places after the clean-up is finished. If a group finishes quickly, they should wait at the

pick-up spot. Adults in cars should monitor the progress.

Drop off the clean-up crews (each crew is three members and one Junior Leader or adult). The crew should be two people on one side of the road and two on the other. Crew members should not cross or walk on the road. One crew person on each side should carry extra plastic bags. Place trash into plastic pails and then put it into a garbage bag. When the bag is about full or difficult to move, put it by the side of the road for later pick-up and continue on down the road. If the crew comes across a large piece of junk (like a muffler or rubber from a tire) put it beside the road to be picked up later. Never put anything on the road.

The pick-up crew should go down the road(s) and collect all the bags and large junk into a truck. Partially-filled bags can then be combined so that full bags are taken to the landfill.

Site Projects

Have club members work in an organized pattern. Start at one side and work across the area rather than jumping around.

Securely tie all bags when full and collect the bags and large items in one spot. If there are a lot of very big, heavy pieces (like washing machines, refrigerators, etc.) you will need either special equipment (from the township, city or county) or a great deal of "people power."

Load up the trucks and dispose of the trash.

As you work, you may have someone take pictures for your club scrapbook.

When you are finished, have refreshments ready for everyone!

Adopt-A-Site

If your club wishes to do more than a one-time clean-up of a site (park, playground, lot) you could consider the "adopt-a-site" project. In this, your club would clean-up a small site on a regular basis. Once a month is usually sufficient.

In adopting a site, your club may want to beautify or fix-up the area after it has been cleaned. Flowers or shrubs could be planted, fences painted and so on. Arrangements could be made to have a public trash

container at the site. Other community groups may be interested in getting involved after done the original clean-ups. Flower or garden clubs, civic and service groups may lend a hand if you or members of your club ask them. (Here is a chance to do some talking before other groups. See Activity 6)

A small sign might be a good way to let the community see who cleans this site. And do not forget your local newspaper could use the story.

Sample Release

In consideration of being permitted to participate in the (name of club) 4-H litter pick-up project, I hereby voluntarily assume all risks of accident or injury and release the Ohio Cooperative Extension Service, its employees, and all (name of club) 4-H advisors from all liability for personal injury or damage of any kind sustained by me or my child during my participation in said project. I acknowledge the hazards inherent in this project, and I have been informed of the steps to alleviate these damages (i.e. broken glass, traffic safety procedures and including wearing gloves and shoes).

Participant

Date

Parent/Guardian
(If participant is younger than 18 years)

Date

Telling It

In this section, record completed activities in which information about litter, litter control or recycling were shared by your club, or members of your club, with others. Fill in Column A and D, your county Extension office will fill in the remaining columns.

	A	B	C	
Activity	How Many Members Did This?	% of Club Participating (A÷Club X 100)	Value Points	Total (BXC)
Made (or helped make) a display.				
Where?			3	
Where?			3	
Made a float for a parade.			3	
Displayed anti-litter posters our club made.			2	
Turned in the Keep Ohio Beautiful project (4-H 917) or application to other related awards.			1	
		D Total # of Times*		
Gave litter or recycling talks to my club. (See Activity 6.)			2	
Gave other public talks on litter or recycling. (See Activity 6.)			4	
Wrote newspaper articles or letters to the editor on litter control or recycling			3	
Shared the results of my club's litter prevention activities with public officials.			3	
Appeared on radio or TV to talk about litter or recycling.			5	
Other activities What?				
Total this page				

* Example: 2 members gave 2 talks each, 1 member gave 1, total number of times = 5

Doing It

This section deals with activities in which your club was actually cleaning up litter, preventing littering or recycling litter. Here you will need to fill in Column E as well as Column A, your county Extension office will fill in the remaining columns.

Activity	A # of Members involved	B % of Club Participating	C Value Points	D Subtotal (BxC)	E Number Of Miles	Total (DxE)
Litter Pick-up Activities						
Our club organized a road or river clean-up. (See Activity 7.)			3			
Our club participated in a road or river clean-ups organized by another group			2			
					Of Days	
Our club organized a fairgrounds or site clean-up. (See Activity 7.)			4			
Our club participated in a fairgrounds or site clean-ups.			3			
Adopt-a-site (See Activity 7.)			5		1	
Litter Containment Activities						
Painted Trash Can			2		1	
Supplied trash can			1		1	
Recycling Activities					Multiply pounds by	
Recycled: Pounds/glass _____ pounds/aluminum _____ pounds/paper _____ pounds/other _____			1		.02= _____ .04= _____ .03= _____ .02= _____	
Other activities What?						

Total this page
Total Knowing It
Total Telling It

Bonus!!

If your club completed one activity on each page add 100

If your club completed two or more activities on each page add another 150

Total Score

The Litter Education Program is administered by the Ohio Cooperative Extension Service, Community and Natural Resource Development, John Rohrer, Director

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