November 24, 2014
Mr. Bart Munger, Board Chairman
Harlem Roscoe FD FPSA
P.O. Box 450
Roscoe, Illinois, 61073

RE: Harlem Roscoe Fd Fpsa, Winnebago County, Illinois
Public Protection Classification: 03
Effective Date: March 01, 2015

Dear Mr. Bart Munger,

We wish to thank you Mr. Gordon Nygren, Mr. Jason Snudden, Mr. Kevin Hillen and Chief Donald Shoefiel for your cooperation during our recent Public Protection Classification (PPC) survey. ISO has completed its analysis of the structural fire suppression delivery system provided in your community. The resulting classification is indicated above.

Enclosed is a summary of the ISO analysis of your fire suppression services. If you would like to know more about your community’s PPC classification, or if you would like to learn about the potential effect of proposed changes to your fire suppression delivery system, please call us at the phone number listed below.

ISO’s Public Protection Classification Program (PPC) plays an important role in the underwriting process at insurance companies. In fact, most U.S. insurers — including the largest ones — use PPC information as part of their decision-making when deciding what business to write, coverage’s to offer or prices to charge for personal or commercial property insurance.

Each insurance company independently determines the premiums it charges its policyholders. The way an insurer uses ISO’s information on public fire protection may depend on several things — the company’s fire-loss experience, ratemaking methodology, underwriting guidelines, and its marketing strategy.

Through ongoing research and loss experience analysis, we identified additional differentiation in fire loss experience within our PPC program, which resulted in the revised classifications. We based the differing fire loss experience on the fire suppression capabilities of each community. The new classifications will improve the predictive value for insurers while benefiting both commercial and residential property owners. We’ve published the new classifications as “X” and “Y” — formerly the “9” and “8B” portion of the split classification, respectively. For example:

- A community currently graded as a split 6/9 classification will now be a split 6/6X classification; with the “6X” denoting what was formerly classified as “9.”
- Similarly, a community currently graded as a split 6/8B classification will now be a split 6/6Y classification, the “6Y” denoting what was formerly classified as “8B.”
- Communities graded with single “9” or “8B” classifications will remain intact.
PPC is important to communities and fire departments as well. Communities whose PPC improves may get lower insurance prices. PPC also provides fire departments with a valuable benchmark, and is used by many departments as a valuable tool when planning, budgeting and justifying fire protection improvements.

ISO appreciates the high level of cooperation extended by local officials during the entire PPC survey process. The community protection baseline information gathered by ISO is an essential foundation upon which determination of the relative level of fire protection is made using the Fire Suppression Rating Schedule.

The classification is a direct result of the information gathered, and is dependent on the resource levels devoted to fire protection in existence at the time of survey. Material changes in those resources that occur after the survey is completed may affect the classification. Although ISO maintains a pro-active process to keep baseline information as current as possible, in the event of changes or questions, please call customer service at 1-800-444-4554, option 2 to expedite the update activity.

ISO is the leading supplier of data and analytics for the property/casualty insurance industry. Most insurers use PPC classifications for underwriting and calculating premiums for residential, commercial and industrial properties. The PPC program is not intended to analyze all aspects of a comprehensive structural fire suppression delivery system program. It is not for purposes of determining compliance with any state or local law, nor is it for making loss prevention or life safety recommendations.

If you have any questions about your classification, please let us know.

Sincerely,

Dominic Santanna
Manager - National Processing Center

Encl.

cc: Mr. Gordon Nygren, Public Works Director, Rockton Water Department
Mr. Jason Snudden, Water Superintendent, North Park Public Water District
Mr. Kevin Hillen, Water Superintendent, Illinois American South Beloit Zone
Chief Donald Shoevlin, Chief, Harlem Roscoe Fire Department
Sergeant Steven Depauw, Central Dispatch, Winnebago County 911 Center
Public Protection Classification
Summary Report

Harlem Roscoe FD FPSA

ILLINOIS

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November 2014
Introduction

ISO collects and evaluates information from communities in the United States on their structure fire suppression capabilities. The data is analyzed using our Fire Suppression Rating Schedule (FSRS™) and then a Public Protection Classification (PPC™) number is assigned to the community. The surveys are conducted whenever it appears that there is a possibility of a classification change. As such, the PPC program provides important, up-to-date information about fire protection services throughout the country.

The Fire Suppression Rating Schedule (FSRS) recognizes fire protection features only as they relate to suppression of first alarm structure fires. In many communities, fire suppression may be only a small part of the fire department's overall responsibility. ISO recognizes the dynamic and comprehensive duties of a community's fire service, and understands the complex decisions a community must make in planning and delivering emergency services. However, in developing a community's Public Protection Classification, only features related to reducing property losses from structural fires are evaluated. Multiple alarms, simultaneous incidents and life safety are not considered in this evaluation. The PPC program evaluates the fire protection for small to average size buildings. Specific properties with a Needed Fire Flow in excess of 3,500 gpm are evaluated separately and assigned an individual classification.

A community's investment in fire mitigation is a proven and reliable predictor of future fire losses. Statistical data on insurance losses bears out the relationship between excellent fire protection – as measured by the PPC program – and low fire losses. So, insurance companies use PPC information for marketing, underwriting, and to help establish fair premiums for homeowners and commercial fire insurance. In general, the price of fire insurance in a community with a good PPC is substantially lower than in a community with a poor PPC, assuming all other factors are equal.

ISO is an independent company that serves insurance companies, communities, fire departments, insurance regulators, and others by providing information about risk. ISO's expert staff collects information about municipal fire suppression efforts in communities throughout the United States. In each of those communities, ISO analyzes the relevant data and assigns a Public Protection Classification – a number from 1 to 10. Class 1 represents an exemplary fire suppression program, and Class 10 indicates that the area's fire suppression program does not meet ISO's minimum criteria.

ISO's PPC program evaluates communities according to a uniform set of criteria, incorporating nationally recognized standards developed by the National Fire Protection Association and the American Water Works Association. A community's PPC depends on:

- **Needed Fire Flows**, which are representative building locations used to determine the theoretical amount of water necessary for fire suppression purposes.
- **Emergency Communications**, including emergency reporting, telecommunications, and dispatching systems.
- **Fire Department**, including equipment, staffing, training, geographic distribution of fire companies, operational considerations, and community risk reduction.
- **Water Supply**, including inspection and flow testing of hydrants, alternative water supply operations, and a careful evaluation of the amount of available water compared with the amount needed to suppress fires up to 3,500 gpm.
Data Collection and Analysis

ISO has evaluated and classified over 48,000 fire protection areas across the United States using its Fire Suppression Rating Schedule (FSRS). A combination of meetings between trained ISO field representatives and the dispatch center coordinator, community fire official, and water superintendent is used in conjunction with a comprehensive questionnaire to collect the data necessary to determine the PPC number. In order for a community to obtain a classification better than a Class 9, three elements of fire suppression features are reviewed. These three elements are Emergency Communications, Fire Department, and Water Supply.

A review of the Emergency Communications accounts for 10% of the total classification. This section is weighted at 10 points, as follows:

- Emergency Reporting 3 points
- Telecommunicators 4 points
- Dispatch Circuits 3 points

A review of the Fire Department accounts for 50% of the total classification. ISO focuses on a fire department's first alarm response and initial attack to minimize potential loss. The fire department section is weighted at 50 points, as follows:

- Engine Companies 6 points
- Reserve Pumpers 0.5 points
- Pump Capacity 3 points
- Ladder/Service Companies 4 points
- Reserve Ladder/Service Trucks 0.5 points
- Deployment Analysis 10 points
- Company Personnel 15 points
- Training 9 points
- Operational considerations 2 points
- Community Risk Reduction 5.5 points (in addition to the 50 points above)

A review of the Water Supply system accounts for 40% of the total classification. ISO reviews the water supply a community uses to determine the adequacy for fire suppression purposes. The water supply system is weighted at 40 points, as follows:

- Credit for Supply System 30 points
- Hydrant Size, Type & Installation 3 points
- Inspection & Flow Testing of Hydrants 7 points
There is one additional factor considered in calculating the final score — **Divergence**.

Even the best fire department will be less than fully effective if it has an inadequate water supply. Similarly, even a superior water supply will be less than fully effective if the fire department lacks the equipment or personnel to use the water. The FSRS score is subject to modification by a divergence factor, which recognizes disparity between the effectiveness of the fire department and the water supply.

The Divergence factor mathematically reduces the score based upon the relative difference between the fire department and water supply scores. The factor is introduced in the final equation.

**Public Protection Classification Number**

The PPC number assigned to the community will depend on the community's score on a 100-point scale:

<table>
<thead>
<tr>
<th>PPC</th>
<th>Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>90.00 or more</td>
</tr>
<tr>
<td>2</td>
<td>80.00 to 89.99</td>
</tr>
<tr>
<td>3</td>
<td>70.00 to 79.99</td>
</tr>
<tr>
<td>4</td>
<td>60.00 to 69.99</td>
</tr>
<tr>
<td>5</td>
<td>50.00 to 59.99</td>
</tr>
<tr>
<td>6</td>
<td>40.00 to 49.99</td>
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<tr>
<td>7</td>
<td>30.00 to 39.99</td>
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<tr>
<td>8</td>
<td>20.00 to 29.99</td>
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<tr>
<td>9</td>
<td>10.00 to 19.99</td>
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<tr>
<td>10</td>
<td>0.00 to 9.99</td>
</tr>
</tbody>
</table>

The classification numbers are interpreted as follows:

- **Class 1 through (and including) Class 8** represents a fire suppression system that includes an FSRS creditable dispatch center, fire department, and water supply.
- **Class 8B** is a special classification that recognizes a superior level of fire protection in otherwise Class 9 areas. It is designed to represent a fire protection delivery system that is superior except for a lack of a water supply system capable of the minimum FSRS fire flow criteria of 250 gpm for 2 hours.
- **Class 9** is a fire suppression system that includes a creditable dispatch center, fire department but no FSRS creditable water supply.
- **Class 10** does not meet minimum FSRS criteria for recognition, including areas that are beyond five road miles of a recognized fire station.
New Public Protection Classifications effective July 1, 2014

We're revising our Public Protection Classifications (PPC™) to capture the effects of enhanced fire protection capabilities that reduce fire loss and fire severity in Split Class 9 and Split Class 8B areas (as outlined below). This new structure benefits the fire service, community, and property owner.

New classifications
Through ongoing research and loss experience analysis, we identified additional differentiation in fire loss experience within our PPC program, which resulted in the revised classifications. We based the differing fire loss experience on the fire suppression capabilities of each community. The new classifications will improve the predictive value for insurers while benefiting both commercial and residential property owners. Here are the new classifications and what they mean.

Split classifications
When we develop a split classification for a community — for example 5/9 — the first number is the class that applies to properties within 5 road miles of the responding fire station and 1,000 feet of a creditable water supply, such as a fire hydrant, suction point, or dry hydrant. The second number is the class that applies to properties within 5 road miles of a fire station but beyond 1,000 feet of a creditable water supply. We have revised the classification to reflect more precisely the risk of loss in a community, replacing Class 9 and 8B in the second part of a split classification with revised designations.

What's changed with the new classifications?
We've published the new classifications as "X" and "Y" — formerly the "9" and "8B" portion of the split classification, respectively. For example:

- A community currently displayed as a split 6/9 classification will now be a split 6/6X classification; with the "6X" denoting what was formerly classified as "9".
- Similarly, a community currently graded as a split 6/8B classification will now be a split 6/6Y classification, the "6Y" denoting what was formerly classified as "8B".
- Communities graded with single "9" or "8B" classifications will remain intact.

<table>
<thead>
<tr>
<th>Prior Classification</th>
<th>New Classification</th>
<th>Prior Classification</th>
<th>New Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>1/9</td>
<td>1/1X</td>
<td>1/8B</td>
<td>1/1Y</td>
</tr>
<tr>
<td>2/9</td>
<td>2/2X</td>
<td>2/8B</td>
<td>2/2Y</td>
</tr>
<tr>
<td>3/9</td>
<td>3/3X</td>
<td>3/8B</td>
<td>3/3Y</td>
</tr>
<tr>
<td>5/9</td>
<td>5/5X</td>
<td>5/8B</td>
<td>5/5Y</td>
</tr>
<tr>
<td>6/9</td>
<td>6/6X</td>
<td>6/8B</td>
<td>6/6Y</td>
</tr>
<tr>
<td>7/9</td>
<td>7/7X</td>
<td>7/8B</td>
<td>7/7Y</td>
</tr>
<tr>
<td>8/9</td>
<td>8/8X</td>
<td>8/8B</td>
<td>8B</td>
</tr>
</tbody>
</table>
What's changed?
As you can see, we're still maintaining split classes, but it's how we represent them to insurers that's changed. The new designations reflect a reduction in fire severity and loss and have the potential to reduce property insurance premiums.

Benefits of the revised split class designations
- To the fire service, the revised designations identify enhanced fire suppression capabilities used throughout the fire protection area
- To the community, the new classes reward a community's fire suppression efforts by showing a more reflective designation
- To the individual property owner, the revisions offer the potential for decreased property insurance premiums

New water class
Our data also shows that risks located more than 5 but less than 7 road miles from a responding fire station with a creditable water source within 1,000 feet had better loss experience than those farther than 5 road miles from a responding fire station with no creditable water source. We've introduced a new classification —10W — to recognize the reduced loss potential of such properties.

What's changed with Class 10W?
Class 10W is property-specific. Not all properties in the 5-to-7-mile area around the responding fire station will qualify. The difference between Class 10 and 10W is that the 10W-graded risk or property is within 1,000 feet of a creditable water supply. Creditable water supplies include fire protection systems using hauled water in any of the split classification areas.

What's the benefit of Class 10W?
10W gives credit to risks within 5 to 7 road miles of the responding fire station and within 1,000 feet of a creditable water supply. That's reflective of the potential for reduced property insurance premiums.

What does the fire chief have to do?
Fire chiefs don't have to do anything at all. The revised classifications will change automatically effective July 1, 2014*.

What if I have additional questions?
Feel free to contact ISO at 800.444.4554 or email us at PPC-Cust-Serv@iso.com.

*The new classifications do not apply in Texas.
Distribution of Public Protection Classification Numbers

The 2014 published countrywide distribution of communities by the Public Protection Classification number is as follows:

![Bar chart showing distribution of Public Protection Classification numbers across classes 1 to 10.]

Assistance

The PPC program offers help to communities, fire departments and other public officials as they plan for, budget, and justify improvements. ISO is also available to assist in the understanding of the details of this evaluation.

ISO Public Protection representatives can be reached by telephone at (800) 444-4554. The technical specialists at this telephone number have access to the details of this evaluation and can effectively speak with you about your PPC questions. What's more, we can be reached via the internet at www.isomitigation.com/talk/.

We also have a website dedicated to our Community Hazard Mitigation Classification programs at www.isomitigation.com. Here, fire chiefs, building code officials, community leaders and other interested citizens can access a wealth of data describing the criteria used in evaluating how cities and towns are protecting residents from fire and other natural hazards. This website will allow you to learn more about ISO's Public Protection Classification program. The website provides important background information, insights about the PPC grading processes and technical documents. ISO is also pleased to offer Fire Chiefs Online — a special secured website with information and features that can help improve your ISO Public Protection Classification, including a list of the Needed Fire Flows for all the commercial occupancies ISO has on file for your community. Visitors to the site can download information, see statistical results and also contact ISO for assistance.

In addition, on-line access to the Fire Suppression Rating Schedule and its commentaries is available to registered customers for a fee. However, fire chiefs and community chief administrative officials are given access privileges to this information without charge.

To become a registered fire chief or community chief administrative official, register at www.isomitigation.com.
Public Protection Classification

ISO concluded its review of the fire suppression features being provided for Harlem Roscoe FD FPSA. The resulting community classification is Class 03.

If the classification is a single class, the classification applies to properties with a Needed Fire Flow of 3,500 gpm or less in the community. If the classification is a split class (e.g., 6/XX), the following applies:

- The first class (e.g., "6" in a 6/XX) applies to properties within 5 road miles of a recognized fire station and within 1,000 feet of a fire hydrant or alternate water supply.
- The second class (XX or XY) applies to properties beyond 1,000 feet of a fire hydrant but within 5 road miles of a recognized fire station.
- Alternative Water Supply: The first class (e.g., "6" in a 6/10) applies to properties within 5 road miles of a recognized fire station with no hydrant distance requirement.
- Class 10 applies to properties over 5 road miles of a recognized fire station.
- Specific properties with a Needed Fire Flow in excess of 3,500 gpm are evaluated separately and assigned an individual classification.

Summary Evaluation Analysis

<table>
<thead>
<tr>
<th>FSRS Feature</th>
<th>Earned Credit</th>
<th>Credit Available</th>
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<tbody>
<tr>
<td>Emergency Communications</td>
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<tr>
<td>414. Credit for Emergency Reporting</td>
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<td>422. Credit for Telecommunicators</td>
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<tr>
<td>432. Credit for Dispatch Circuits</td>
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<td>3</td>
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<td>440. Credit for Receiving and Handling Fire Alarms</td>
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<tr>
<td>Fire Department</td>
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<td>513. Credit for Engine Companies</td>
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<td>523. Credit for Reserve Pumpers</td>
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<td>532. Credit for Pump Capacity</td>
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<td>549. Credit for Ladder Service</td>
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<td>553. Credit for Reserve Ladder and Service Trucks</td>
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<td>581. Credit for Training</td>
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<td>590. Credit for Fire Department</td>
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<td>616. Credit for Supply System</td>
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<td>621. Credit for Hydrants</td>
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<td>Divergence</td>
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<td>1050. Community Risk Reduction</td>
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