Among all the activities associated with mining operations, surface blasting may be the activity which causes the most concern to people living or working near a minesite. If blasting is done improperly, it can endanger life, property and the environment. Even when done properly, it is highly noticeable and can be disturbing to some people.

Federal and state law and regulations contain extensive controls on blasting which, if followed, can insure that blasting is carried out in a safe and effective manner. They also contain requirements to insure that local citizens receive adequate notice about significant aspects of proposed blasting operations and about their rights in relation to the blasting operations. It is essential that blasting requirements be complied with faithfully. Blasting is so important that it is appropriate for this department to publicly remind permittees of their obligations in blasting so as to encourage continued compliance and to make clear this department’s commitment to effective enforcement of these requirements.

Particularly important to a good understanding and a positive relationship between permittees and the public are the requirements for the permittee to provide notice to people near the permit area about their right to request preblasting surveys and about blasting schedules.

**PREBLASTING SURVEYS**

(See 405 KAR 16:120/18:120 Section 2.)

Subsections (1) and (2):

At least 30 days before commencing blasting the permittee must provide written notice to residents or owners of dwellings or other structures located within one-half mile of the permit area (the area affected by surface operations and facilities, for underground mines). The notice must advise the person of his right to request a preblasting survey and must explain how to request a survey. The notification must state the permit number and the name of the permittee, and the address of the permittee to which the request can be sent. The notification must explain that the person may send his request to either the permittee or DSMRE, and give the mailing address of the appropriate regional office of DSMRE.
The notification must also explain that if a structure is renovated, modified, or added to after a preblasting survey has been performed, then upon request a survey of the additions and renovations will be performed.

The obligation to provide a preblast survey extends to wells, barns, sheds, water towers, communication towers, and other structures on a case-by-case basis. Owners of these structures must be notified even if they are governmental entities.

The enforcement of this performance standard entails that the permittee provide certified mail, or affidavits, or photographs, or other documentation that the written notice has been provided at least 30 days prior to blasting. This documentation must be available for inspection immediately subsequent to blasting, and proof of notification is the responsibility of the permittee.

To emphasize, the half-mile radius relevant to preblast surveys applies to any bonded surface disturbance portion of the permit area including ponds, roads, slides, or any other surface disturbance areas in addition to the coal removal area. Note that the survey process must be conducted prior to initiating blasting on newly bonded increments and amendment areas if not previously conducted. Inspectors are responsible for confirming that residents/structure owners have been properly given the opportunity to request the survey, and discovery that this has not occurred can result in enforcement action.

The permittee can meet his minimum requirements with the notification contents described above. However, the department highly recommends that the notification further explain the preblast survey so a person considering whether to request a survey will understand the purpose of the survey, how it will be done and what it will cover, that the person has a right to disagree with the survey and how he can report that disagreement, and who will have copies of the survey report.

The last page of this RAM is a suggested letter that permittees may use to notify persons regarding preblasting surveys. The permittee is under no obligation to use this suggested letter.

Subsections (3) and (4):

The department not only checks to confirm that all eligible residents/owners have been notified and that all who request the survey have been provided the survey, but also, whether the survey has been properly conducted. Current regulations require the permittee to provide the cabinet (i.e. the DSMRE regional office) with a copy of the written report. While inspectors are not routinely trained to do preblast surveys, some departmental employees do have this expertise and will be used as needed. It is expected that survey completeness and accuracy will become an issue primarily when the owner of a structure disagrees (in writing) with the results of the survey. Again, a finding by the department of an inadequate survey may result in an enforcement action to correct the survey.
Subsection (5):

To protect the permittee from undue delays in initiating blasting, requests for surveys must be made more than 10 days from the announced initiation date. Surveys requested after the 10 day prior date will still have to be conducted promptly, but will not delay the initiation of blasting.

**BLASTING SCHEDULES**

(See 405 KAR 16:120/18:120 Section 3.)

**Surface Mines.** Between 10 and 30 days prior to commencing any blasts that use more than 5 pounds of explosives, the permittee must publish a blasting schedule in a newspaper of general circulation in the area. Also, copies of the schedule must be distributed to local governments and public utilities, to the appropriate regional office of DSMRE, and to each residence within one-half mile of the blasting site described in the schedule. It is recommended that the permittee carefully consider the description of the blasting site when composing the schedule for publication. The "blasting site" can be defined to delineate portions of the permit where blasting is likely to occur. Thus, the blasting site could be comprised of far fewer acres than the permit area and, as a result, decrease the extent of residences within one-half mile requiring notification of the blasting schedule. The schedule must contain the name, address, and telephone number of the permittee; identify the specific areas in which blasting will take place; identify the dates and time periods when blasting will take place; identify the methods to be used to control access to the blasting area; and identify the types and patterns of audible warnings and all-clear signals to be used before and after blasting.

The permittee must republish and redistribute the schedule at least each 12 months, and must republish and redistribute a revised schedule between 10 and 30 days prior to blasting whenever the area covered by the schedule changes, the actual time periods for blasting differ significantly from the prior schedule, or the permittee changes the types or patterns of warning or all-clear signals identified in the prior schedule. The permit must be revised before the blasting schedule is changed. Permittees are advised that the republication and redistribution requirement may redefine "blasting site" so as to exclude reclaimed areas, thus reducing the extent of distribution.

**Underground mines.** Because surface blasting is infrequent at underground mines, newspaper publication of a blasting schedule is not required. Between 24 hours and 30 days prior to surface blasting, permittees must provide written notice to each residence within one-half mile of the area affected by surface operations and facilities, to the appropriate regional office of DSMRE, and to local governments and public utilities. The notice must state the proposed times and locations of blasting operations and the characters, patterns and meanings of the warning and all-clear signals. The blasting times, locations, and signals described in the notice must be approved in the original permit or in a later permit revision.
As with preblast survey documentation, proof that the blasting schedule has been
distributed is the responsibility of the permittee. Inspection after blasting commences
will include verification of the documentation. Failure to properly distribute and/or
document will result in enforcement action.

ADDITIONAL COMMUNICATIONS
ABOUT THE MEANINGS OF AUDIBLE WARNINGS
AND ALL-CLEAR SIGNALS

(See 405 KAR 16:120 Section 4(2) and 18:120 Section 3(2).)

The permittee must, by appropriate means of communication, periodically advise
persons within the permit area (surface operations area, for underground mines) and
persons who live or regularly work within one-half mile of the permit area (surface
operations area) of the meaning of audible warning and all-clear signals. The purpose
of this requirement is to insure notice to persons who work in the permit area (surface
operations area) or within one-half mile of the permit area (surface operations area) but
do not live there and thus do not receive notice when the permittee mails copies of the
blasting schedule to residences.

The permittee has considerable latitude in how to do this. For example, if a business
establishment is located within one-half mile of the permit area (surface operations
area), the permittee could simply mail the business a copy of the blasting schedule
whenever the permittee mails blasting schedules to residences in the area. For a
workplace such as a construction site, it may be more convenient to deliver a copy of
the blasting schedule or to provide a verbal explanation of the warning and all-clear
signals.

CONCLUSION

This RAM is intended to promote increased awareness of blasting requirements, and to
stress the particular importance of notifications which permittees are required to
provide to local people who may be affected by surface blasting activities. Serious
commitment to these notifications and associated procedures such as preblasting
surveys can go a long way in helping mining operations remain the kind of good
neighbors that both permittees and local people want them to be. People living or
working near mines may have fewer blasting-related complaints if they have better
information about what to expect from blasting operations.

One last word to the wise permittee: please remember that documentation is very
important. Your blasting records will be inspected at least quarterly during our
complete inspections. The more thorough and accurate records you have to
demonstrate your efforts to comply with all the blasting requirements, the better you will
be protected.
NOTICE OF YOUR RIGHT TO REQUEST A PREBLASTING SURVEY

(name and address of resident or owner)

______________________________________________

______________________________________________

______________________________________________

Telephone: ____________________________________

Your home, school, church, shop or other manmade structure is located within 1/2 mile of the surface mining permit no. ___________, of _______________ Coal Company. The mining operation is located in the _____________ area of _______________ County. The latitude is 00° 00’ 00”, and longitude is 00° 00’ 00”.

Federal and state laws and regulations (405 KAR 16:120/18:120, Section 2) require that the coal permittee notify residents or owners of any manmade structures within 1/2 mile of the permit area of their right to request a preblasting survey of the structure. This survey is conducted at no charge to the resident/owner and it is done at the resident's/owner's convenience.

It is not expected that the blasting will cause any problems or damage. However, a preblasting survey is required and conducted for the protection of the resident's/owner's property. The survey will determine and document the existing condition of the structure(s), and any physical factors that could reasonably be affected by the blasting. If wells are used for the water supply, a water sample will be taken and included with the survey. In addition, the permittee should be notified (by the resident/owner) if any changes are made to the structure so the survey can be updated.

Upon completion of the survey, the original copy will be on file at the mine office, one copy will be sent to the regional office of the Kentucky Department for Surface Mining (DSMRE), and one copy will be sent to the resident/owner. If the resident/owner disagrees with the results of the survey, he can notify (in writing) both the permittee and DSMRE. You can request the survey by writing either:

DSMRE Regional Office Address

______________________________________________

______________________________________________

Telephone ________________________________

Permittee Address

______________________________________________

______________________________________________

Telephone ________________________________

Please include the following permit number in your request: _____________________________

Sincerely,