Rocket Society develops solid fuel; hopes to test actual performance

By Stewart Hilkeman

The MIT Rocket Research Society is a small group of students, both graduate and undergraduate, dedicated to serious study in the field of rocketry. At present they are working with a solid fuel of polyurethane base, which to the best of their knowledge is comparable to the fuels used by the government.

The fuel dries into a blue rubbery substance which may be safely molded or machined to the proper shape. It also has the advantage of releasing its relatively low burning rate even at pressures of 600psi. The discovery and original research is credited to Frank Kosden '63, a physics major and member of the society. This achievement gained him the Chrysler Award for outstanding work in rocketry in 1961 and 1962.

This year the society hopes to send a rocket several miles high with some sort of tracking device from which they can learn the height and the burnout velocity. Only in this way will they be able to compare theoretical to actual performance.

Such plans will be delayed, however, until the problems with the society's thrust stand have been ironed out. Also, it seems to be extremely difficult for an amateur to get clearance for a shot of this height. Fisher's Island in Long Island Sound has been offered as a possibility but does not seem to be working out.

(Turn to page 16)

History of 'Yeoman'

By Dan Anton

'Teoman of the Guard' was Gilbert and Sullivan's only tragic opera. During the late 1800's the pair wrote numerous comic operas to be performed by the D'Oyly Carte Opera Company in England. They were wildly regarded by theater-goers—as well as by themselves. Gilbert wrote the words and Sullivan the music; each thought his contribution was the most important, and this caused constant bickering between them.

'Teoman' written

It had been several years since their last show when the pair was asked to write another by D'Oyly Carte. Sullivan was—at first—indefinite, but when he saw Gilbert's draft of 'The Yeoman of the Guard, or the Merryman and His Maid,' he, too, became enthusiastic. In six weeks, the music was written and, two days later, the show opened. It was an immediate success, enjoying one of the longest runs of any Gilbert and Sullivan operetta.

Tech Show first

After 'Yeoman' Gilbert and Sullivan wrote only three more shows, only one of them well known nowadays. Their last collaboration, 'Grand Duke,' was given its first American performance at Tech Show, 1960. Since then, the words and music to 'Grand Duke' have completely disappeared—there is not one complete copy anywhere.

First of 'Yeoman's' very involved

'Teoman of the Guard' has a plot that is unusually complicated for a Gilbert and Sullivan operetta.

Ellen Stevens, a secretary at MIT, will volunteer her talents as Phoebe in 'Yeoman of the Guard.'

G&S Society in its third year

A pair of travelling jesters, lately come to town, rehearse their act. Kneeling with gown fanning out in all directions is Elsie, played by June Cooppoon, and bending over her is her fiancé, Jack Point, played by Ron Mallis. Elsie's fiancé, Jack Point, dies of a broken heart. Realiing he cannot have Elsie, he faces Elsie with the news that he is in love with Elsie, and they live happily ever after. Realiliy, he cannot have Elsie, Jack Point dies of a broken heart.

MIT G & S Society formed

Back in 1959, from Doug Moore, a Gilbert and Sullivan Society. He built support with Norm Raelman, Martin Laxby and Leo Goldstein until April 1961, when the Society put on its first performance— excerpts from 'The Sorceror' and 'Iolanthe.' In fall of last year, the Society presented its first complete opera, 'DSS Pinaneer.' Humanities instructor Steve Gilloore decided to join the group as its sorely needed director. Then, last spring, the society put on 'Pinaneer' in the Hayden Library Courtyard. The performances were sold out completely, but due to heavy costs, the Society sustained a large loss. Steve Gilloore is also the director of 'Yeoman of the Guard,' to be presented both Friday and Saturday evenings in Kresge Auditorium at 8:30. Don't miss it.

YES!

Tickets Still Left

<table>
<thead>
<tr>
<th>Location</th>
<th>Price</th>
</tr>
</thead>
<tbody>
<tr>
<td>LOS ANGELES</td>
<td>$201.50</td>
</tr>
<tr>
<td>DENVER</td>
<td>$179.89</td>
</tr>
<tr>
<td>ST. LOUIS</td>
<td>$111.05</td>
</tr>
</tbody>
</table>

Christmas

Also at Christmas via Greyhound Cruiser

<table>
<thead>
<tr>
<th>City</th>
<th>Price</th>
</tr>
</thead>
<tbody>
<tr>
<td>New York City</td>
<td>$10</td>
</tr>
<tr>
<td>Baltimore-Washington</td>
<td>$20</td>
</tr>
</tbody>
</table>

Tickets go on sale after Thanksgiving

Tech Travel Service

T.S.E., the Armory, x7010 or 864-3194