1. Will this new course affect a current program?  
   Yes [ ]  No [X]  
   If "yes", has a Program Revision Form been submitted concurrently?  
   Yes [ ]  No [X]

2. Teaching Department:  
   Physics

3. Administering Faculty/Unit:  
   Science

4. Campus  
   (Downtown, Macdonald, Off Campus, Distance Ed, Other – specify)  
   Downtown

5. Effective Term of Implementation  
   (Ex. Sept. 2004 = 200409)  
   Term: 200701

6. Responsible Instructor  
   R. Rutledge

7. Course Title (Limit 30 Characters) - required for all courses:  
   Observ Tech of Mod Astrophys

8. Course Number(s)  
   Indicate course number & the number of terms spanned:  
   (tick all that apply)  
   Subject/course number: PHYS 641
   Course(s) Span:  
   [X] 1 term  
   [ ] 2 consecutive terms (D1, D2)  
   [ ] 2 non-consecutive terms (N1, N2)  
   [ ] 3 consecutive terms (J1, J2, J3)

9. Course Title to Appear in the Calendar (optional)  
   (Limit 59 characters):  
   Observational Techniques of Modern Astrophysics

10. Credit Weight  
   (or CEU's for non-credit CE courses):  
   3

11. Rationale for new course  
   This proposed course is one of several changes to expand graduate core-level curriculum in astrophysics in the department of physics, as described in "Graduate Curriculum for Masters and Ph.D Degree Students in the Department of Physics, Specializing in Astrophysics." Following the 2000-6 expansion in astrophysics from two to eight faculty, and the expected expansion in the number of MSc and PhD-level students over the next decade, the proposed curriculum will provide coursework at the MSc and PhD level equal to that available at top-tier international programs.

12. Course Description  
   (as it will appear in the Calendar [maximum 50 words]):  
   (N.B. Faculty of Medicine must append complete course outline)  
   Mechanical, electrical, optical, and analytic techniques used in modern astrophysics research. Electromagnetic, gravitational and particle-based observing. Relevant and topical observational problems, contact with forefront of observational research.

13. Supplementary information to appear in the Calendar in addition to the course description.  
   Such as: equivalent course(s), contact hours, enrolment limitations, language of instruction etc.  
   Please enter the information as it should appear in the calendar notes.
14. Schedule Types(s):  
(Enter all that apply – see course guidelines for a complete list.)  
(i.e. Lecture, Labs, Tutorial)  

<table>
<thead>
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<th>Lecture</th>
<th>Hours per Week</th>
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Total Hours per Week: 3  
Total Number of Weeks: 13  

15. Projected Enrolment:  
10  

16. Required text and/or preliminary reading list sent to library?  
X Yes  

17. Prerequisite(s) (Courses or Tests)  
Specify course number(s) or name(s) of test(s):  
none  
none  

If the student does not have a prerequisite should web registration be blocked?  
☐ Yes  ☑ No  

If “Yes” complete A and B:  
A. Indicate minimum grade or test score(s) the student must attain in prerequisite course(s) or test(s):  

B. Can the prerequisite course(s) or test(s) be taken in the same term as this course?  
☐ Yes  ☐ No  

18. Corequisite(s) Course Number(s):  
Specify course number(s) and title(s):  
none  

If the student does not register for the corequisite in the same term should web registration be blocked?  
☐ Yes  ☑ No  

19. Restriction(s):  
Enrollment in MSc or PhD program, or permission of the instructor.  

20. Consultation Reports Attached  
☐ Yes  ☑ N/A  

21. Additional Course Charges (must be approved by the Fee Policy Committee)  
Description of Fee  
(e.g. screening fee)  
None.  
Amount  

22. Requires Teaching, Physical, or Financial Resources  
Not Currently Available (attach explanation)  
☐ Yes  ☑ No
<table>
<thead>
<tr>
<th>Route</th>
<th>Department Meeting</th>
<th>Departmental Chair</th>
<th>Other Faculty</th>
<th>Curric/Academic Committee</th>
<th>Faculty</th>
<th>SCTP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Charles Gale</td>
<td>Charles Gale</td>
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<tr>
<td>Signature</td>
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</tr>
<tr>
<td>Contact Person</td>
<td>Robert Rutledge, 398-6509, <a href="mailto:Rutledge@physics.mcgill.ca">Rutledge@physics.mcgill.ca</a></td>
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INFORMATION FOR ADMISSIONS, RECRUITMENT & REGISTRAR'S OFFICE

To be completed by the Faculty
Slot Course: □ Yes □ No
CIP Code

To be completed by ARR

For Continuing Education Use
CE Admin. Unit:
CE Non-Grant Courses:
Flat Rate: CdnFlat Rate: □ Yes □ N/A

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23. Approvals:

Routing Sequence

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<tr>
<th>Name</th>
<th>Signature</th>
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<th>Department Contact Person (name/phone/email)</th>
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