

Processing Fee of	f Rs.200/- (Rs.100/- for SC/ST)
Please enclo	ose Original pay-in slip
Appln. No	dtd
• •	

Paste your recent passport size photograph (3.5 cmX 3.5 cm) Do not staple or Pin the photo

Signature of the Candidate

# KISHORE VAIGYANIK PROTSAHAN YOJANA – 2009

APPLICATION FORM FOR STREAM SP (ENGINEERING)

Last date for submission of completed Application form is 11<sup>th</sup> September 2009

• Stream SP (ENGINEERING): Students enrolled in First year B.E./B.Tech./B.Arch. during the academic year 2009 – 2010 and have secured a minimum of 60% (50% for SC/ST) marks in aggregate in X and XII Standard Board Examinations. Students enrolled in the Second year B.E./B.Tech./B.Arch. program must have secured a minimum of 60% (50% for SC/ST) marks in the I year examination. A hard copy of an original and creative science / engineering based research project is required along with the application.

Application No.

- a. Applicants may apply either by Hard Copy or Online. (<a href="http://www.iisc.ernet.in/kvpy">http://www.iisc.ernet.in/kvpy</a>)
- b. Application forms may be downloaded from the KVPY Website. Those who are unable to do so, may request for a Hard Copy.
- c. Hard copy of the application form can be obtained from KVPY on request by sending a processing fee of Rs. 200/- (Rs. 100/- for SC/ST) by means of remitting Rs. 200 (Rs. 100/- for SC/ST) "to any core banking branches of STATE BANK OF INDIA, payable at all branches in India. Paid into the credit of Administrative Executive, KVPY A/c. No. 10270577392" and send the "pay-in-slip" along with the request, clearly indicating the stream (i.e. SP (Engineering) on the request form.
- d. The SC/ST candidates should provide a copy of the caste certificate issued by the competent authority in the prescribed proforma.
- e. The completed application form along with the
  - (a) Caste certificate in the case of SC/ST candidate
  - (b) A hard copy of the Project report
  - (c) Processing fee of Rs.200/- (RS.100/- for SC/ST) original pay-in-slip
  - (d) Copy of the marks statement of the qualifying examination

should be sent to KVPY on or before 11.09.09

### GENERAL INSTRUCTIONS FOR THE SP STREAM (ENGINEERING) APPLICATION

KVPY is a program to recognize and reward creative and innovative talent of youngsters in India. The project that you present as part of this application should preferably be based on novel and unconventional ideas. Your project should demonstrate the practical execution of your ideas. The project must show that you are creative and adventurous and ready to explore.

The project in this KVPY application must involve a substantial practical or experiment component. If the project is software oriented, good theoretical component would also be looked for, in addition to a high level of sophistication in implementation. Applicants are strongly urged to come up with original project.

Improvement of an existing product or a technique may be accepted provided such improvement involves original ideas and creativity. You may try to incorporate some addition to the design or practical implementation that improves an existing technique.

#### **Applications of the following type are discouraged:**

- Project in which there has been detailed guidance by experts
- Project that are merely a literature survey
- Mere copy of a product or a method available in a book, magazine, Journal or Internet
- Heavy use of sophisticated facilities without a very substantial component of originality
- Project that is just a write-up describing what one wants to do but has not tried to do it practically. (Failures are accepted provided an attempt was made to implement the idea practically).

The main criteria that would be followed for selection for the interview (in December January of every year) would be originality and innovation. Only after these are met, the level of sophistication, and the nature of the project (greater weightage for interdisciplinary project) would be taken into consideration.

Note: Fill in all the items in this form. The project report for Item 2 in Section B should be attached as separate sheets. You may use an additional sheet for Item 3 in Section B if necessary.

**Section A:** Pertains to your background. Give your name as it appears in your school and college records. In Item 9(c) and 10(b), give the marks of Science subjects only. Make sure that it is attested by your supervisor with the official stamp giving his/her designation.

**Section B:** The main part of your KVPY application is a practical science/engineering project done by you on your own. This project must be certified to be "Original and complete as claimed by the applicant" by a college/university teacher (not necessarily from your institution).

#### Certification:

The supervisor of the project shall authenticate the completion of the project. It is recommended that he/she does not suggest the topic or give detailed guidance.

A few examples are given below for illustration:

- Changes that will significantly improve the performance of a circuit. Describe the concept theory being the change theoretically and practical implementation and test results that prove your idea.
- Novel method for detoxification of a particular industrial effluent. Outline the theoretical basis and describe the tests and experimental results.
- A novel algorithm that is very simple to implement and performs as well as complex method currently in use. Describe the algorithm, how it was programmed and tested. Include outputs.

Postal Address : The Convener

Kishore Vaigyanik Protsahan Yojana

Indian Institute of Science Bangalore – 560 012

Phone. No. : 080-23601008/22932975/22932976

Fax. No. : 080-23601215

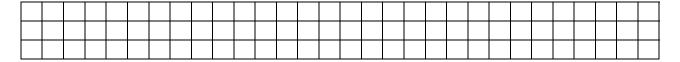
e-mail : <u>kvpy@admin.iisc.ernet.in</u>

Website : http://www.iisc.ernet.in/kvpy

# **Section A**

Type	or V	Writ	e in	CA	API	TA	LL	EΤ	TE	RS														
1 F	11 NT																							
1. Fu	II N	ame	•																					
																							$\Box$	
2. Ad	ldres	ss fo	or co	orre	spc	nde	ence	e																
			1												1								$\overline{}$	
																							+	
																							$\Box$	
		-ma	1 . /	if o	1101	lob																	$\perp$	
	6-	-111a	п. (	II a	vai	iau.	16)																	
3. Ph	one	Nu	mbe	er w	ith	ST	D c	ode	e (if	av	aila	ble	)											
4. Da	ite o	f Bi	rth																					
	D	D	N	I N	<u>/                                    </u>	Y	Y	Y	Y															
5. Ge	nde	r																						
	N	Iale			I	Fem	nale																	
6. Ca	tego	ory																						
	G	ene	r		5	SC/	ST																	
7. <b>N</b> a	me	of t	he C	Coll	ege	: / L	J <b>niv</b>	ers	ity	cur	ren	tly	enr	olle	ed ir	1								

8. Address of the College



$^{\circ}$	D	4	4 1	1 4	4 4
9.	Pres	ent s	тио	lent	status

(a)	I ha	ave j	joined	in I	First/S	Seco	nd y	ear B.	E, I	3.Tech	/B.	Arch	.in 20	)09-	201	0.					$\Box$	Br	anch
(b)	Na	ame	of the	XS	Std or	equ	ival	ent Scl	100	1 Boar	d E	kam											
									1	1 1								1		<u> </u>	_		_
			<u> </u>	1			1																
																							_
(c)	M	arks	s obta	ine	d in t	he X	X St	d Scie	nce	e subje	ects	:											
		Mat	thema	tics																			
		Scie	ence																				
0. (a) Na	me o	f the	e XII	Std	or ec	quiv	aler	nt Scho	ool	Board	l Ex	kam											
` `			<del></del>						1				-			1						_	
(b) Ma	rks o	btai	ned ir	the	e XII	Std	Sci	ience s	ub	jects:													
Iathemati	cs :					P	hys	ics	- :					Г	Othe	ers		1:					
									_														
iology	:		T			-	hen	nistry	- :					A	ggre	ega	ite	] :					
2,									_														
(c) Mark	rs oht	taine	ed in	Ict v	zear l	R E	/R '	Гесh /I	R A	Arch													
				ist j	, car i																		
l. No.		Sub	ojects			1	Mar	ks Ob	tair	ned		P	ercei	ıtag	ge				C	las	S		
																	-						
											1						Ī						

11. Is the project report in the KVPY application designed and done primarily by the applicant or the supervisor (i.e., the person who certifies originality and completeness of the project)?
[ ] Student [ ] Supervisor
12. Has the practical testing of the project be completed?  It is strongly recommended that photographs of your experiments or prototype be attached.
Yes [ ] No [ ]
Signature of the Applicant
Signature of the Supervisor, with full name, designation and affiliation
Date:
Place:

## **Section B**

1. Detailed report of a project done for the KVPY application is to be attached separately.

# **Specific Instructions for the report:**

The report should be about 5 pages long. A short precise report will receive better attention than a long convoluted one. The report of your project should contain the following parts:

- a) **Background:** What are the uses or applications of your project? What are the related instruments/solutions that are used for similar applications?
- b) **Design Outline:** Design equations, circuit diagrams, experiment design, algorithm/structure, etc. Basic equations and textbook material should be clearly distinguished from your own ideas.
- c) **Innovative component in the design:** Mention what is your own contribution to the project design and how it is different from (and better than) commonly used methods.
- d) **Test results:** How was your project tested? It is important to summarise your results and not simply list all your measurements.

If your project is algorithmic (theory) you must *justify* it. If your project is algorithm and implementation you must *justify* the algorithm and give evidence that the implementation is complete through *results*.

If your Project is theoretical, your proofs must be *completed* and application (including that of development of theoretical results) must be declined.

2.	Giv	e a	summ	ary of	the pro	ject. Ca	refully	follow	the	give	en form	at. Wri	te clear	dy a	nd do	not
exc	ceed	the	given	space.	Please	read th	e instr	ructions	for	the	project	report	before	you	write	the
sui	nma	ry.														

a)	Title:
b)	Goal or aim of the project:
c)	Source of the idea:

- d) Your addition or innovation:
- e) What is the significance of your contribution? (e.g. simpler design than conventional, more efficient, cheaper, etc.)
- f) Results obtained in your project. [Show strong evidence that your project is indeed complete. Direct attention, if it is experimental, to detailed readings in your report. Wherever possible, provide relevant photographs. If it is theoretical, state your main results (which should have been proved clearly in your report)]

3. Have you undertaken any project (other than the project for the present KVPY application) or research activity independently in the last 3 years? If so, mention a descriptive title, the year (and the class you were in) and if it was entered in any school science exhibition or equivalent.

Sl. No.	Title of the project (the title should describe the content of the project)	Year and class you were in at that time	If the project was entered in any science exhibition/competition, give the name of the exhibition /competition.

I declare that all the information	on given above is correct.	
Student's Signature		
Date: Place		
I certified that the information	given above is correct to the bo	est of my knowledge.
Date: Place:		
	Signature of	the Head of the Institution

with seal