E
very summer, millions of stu-
dents have a tough time select-
ing the right engineering col-
lege that will open doors to an
exciting career. Typically, students
are faced with the decision of choosing
colleges. Unfortunately, both argu-
ments are naïve. Recruitment. Unfor-
luckily, both arguments are naïve.

Two more assumptions: (i) The college
with a high brand recall provides quality
education, and its alumni are successful
in the real world. (ii) Employers know
which colleges provide better quality
education and go to those campuses for
recruitment. Unfortunately, both argu-
ments are naïve.

Brand image
While some colleges (such as the IITs)
have a high brand recall because of their
quality of education as is reflected by the
achievements of their alumni and the
research output of faculty and graduate
students, other colleges have high brand
recall due to advertising on a large scale.
Smaller colleges cannot afford the same
advertisement budgets and hence lose
out on branding even if they provide
good quality education.

Smaller (and newer) colleges do not
attract enough recruiters either. Com-
panies that recruit thousands of students
from campuses every year would typi-
cally not go to campuses where they are
likely to get just 5-10 potential employ-
ees. And companies that recruit very few
students would typically not add a new
college to their recruitment drive.

The parameters
So, how does one find out which col-
lege provides quality education? We list
some parameters, which will help you
compare colleges. Most of the informa-
tion is available on the website. If not,
try to get it from current students and
alumni of the college. In a worse case
scenario, make a personal trip. All this
is not easy. But this must be done in order
to make an informed choice as your
entire career will be influenced by this.

The faculty
- How qualified is the faculty? Review
the number of faculty members
with a PhD degree. While some of
the faculty members without a PhD may
be very good teachers (and some even
researchers), they are fewer in number.
Similarly, one should see the number of
faculty members with an MTech degree.
If the college hires many faculty mem-
bors with a Btech or MSc, the quality
may not be up to the mark. Also, check from where the faculty
members have received their highest
degrees. Prominent names increase chances of a better quality of education.

For instance, if the faculty members
received their highest degrees from
the same institute, this reflects positively on the
quality of education. Faculty members
with an earlier degree from the same
institute and a higher degree from a good
institute reflects positively on the qual-
ity of teaching.
- How active is the faculty in research?
A faculty member who is active in
research will normally have a better
understanding of the latest develop-
ments in the area, and will therefore be
in a position to explain better. One need
not be a top class researcher to be a good
teacher but without doing any research,
it is difficult to teach well. Review the
list of research publications by the fac-
ulty members, and see if these publica-
tions are featured in reputed journals
and at conferences. You may need some
help from researchers to really judge.
Also, look whether they have research
projects funded externally by the indus-
try or government-funding agencies. It
shows that others value their research.
Also look at college activities or those of
the specific department of your interest.
Are there many visitors giving semi-
cars? Do they organise workshops and
conferences regularly?
- The number of faculty members.
The faculty to student ratio is an impor-
tant aspect affecting the quality of edu-
cation. Generally, learning is better when
the average class size is smaller. And that
happens with substan-
tial faculty strength. Also, having a poor
ratio means that the teaching load on
the faculty will be higher, and therefore,
they may not find time to do research.
Also, they may not give as many assign-
ments and projects, since grading them
would mean a lot of work.

Next, infrastructure
This is the second important aspect.
How good are the labs in the discipline
of your choice? Do they have modern
equipment, and in enough numbers so
that students work together simultaneously
as opposed to just a demonstration by a
lab instructor? How good is the common
lab? How well are the labs maintained?

- Status of the institute: a university
status typically would mean greater aca-
demic freedom for innovation.
- A fully-residential campus usually
provides a better learning environment.
- Curriculum: How often is it updated?
- How many courses do they teach? Note
that an institute that has too many
courses is in fact not likely to do a quality
job of teaching.
- Curriculum flexibility: How many
electives does it offer? Do they actually
offer a lot of choice in those electives?
- What do graduates do? Do they all
go for jobs, or do they also go for higher
education? If graduates are going for
higher education, then it shows that the
institute has been successful in igniting
the interest of learning in the students.
- A related point is the performance
of students in third party exams like
GATE, CAT, etc.

Is there an active alumni associa-
tion (particularly for colleges, which
are more than 10-15 years old?). If the
alumni don’t care about this college,
then why should anyone else?
- Campus placement. Of course, it
should be considered. Just don’t con-
sider it as the only parameter.
- Accreditation by NAAC or NBA.
- Student activities: You want to enjoy
your four years and not just spend time
in labs and the library! So make sure that
there are enough extra-curricular activi-
ties on the campus.
- Student participation in institute
administration: Do they groom leader-
ship qualities amongst the students?

You may think it’s tough to get all this
information. However, if you focus on
just the colleges you are serious about,
then it's not too difficult. The college website
should also come in handy. If the website
has very little information, you should
be alarmed because it implies either
disinterest or unavailability of informa-
tion. But there are many websites on the
Internet which host fora to discuss such
issues. Most colleges would have a pres-
cence on social networking sites where
you can connect people from those col-
leges. Spending some time on research
will make sure that you do not regret
your decision four years later.

Illustration: Indu Harikumar

 factors that determine the quality of your education
An IIT professor suggests the appropriate questions to ask in your bid to identify the right college and branch

by Dheeraj Sanghi