

# Between the Lines

## Kishwaukee College's CAD Technology Program Newsletter

Volume 2, Issue 2

PLEASE POST

Fall 2012

### Sign Up Early for CAD!

#### Low enrollment courses could be cut.

The fall semester begins again on August 27<sup>th</sup> and the CAD Technology Program at Kishwaukee College will again be offering courses meeting once or twice a week for 4, 8, 12 or 16 weeks.. Students should be sure to sign up well before these dates arrive to assure their desired course will meet as expected.

Courses to be offered this semester include:

- CAD106 Orientation to Consumer Design (1<sup>st</sup> 8)
- CAD110 Orientation to CAD (1<sup>st</sup> 4)
- CAD110 Orientation to CAD (1<sup>st</sup> 8 Saturday Mornings)
- CAD111 Technical Drafting (Last 12)
- EGR277 Engineering Graphic / CAD (Last 12)
- CAD131 Print Reading for Const. Trades (16)
- CAD151 Fundamentals of CAD – AutoCAD (1<sup>st</sup> 8)
- CAD152 Intermediate CAD (2<sup>nd</sup> 8)
- CAD171 Fundamentals of CAD – SolidWorks (Last 12)
- CAD251 3-D CAD Modeling, Render. Animation (2<sup>nd</sup> 8)
- CAD270 Drafting and Design Internship (16)

*continued on page 2*

### ALSO IN THIS ISSUE

- 2 Donations Received!
- 2 New CAD Video Promo!
- 2 CAD in Cloud Computing!
- 3 Two Spring Fieldtrips?!?
- 3 Competition Winners
- 3 Outstanding CAD Student

### New Equipment Coming!

#### 3-D Printer/Plotters are very Cool!

This past spring CT Division Dean Sara Pohl and Associate Dean Matt Feuerborn helped instructors Bob Lawrence (AET) and Mark Schwendau (CAD) secure Carl Perkins III money to purchase a 3-D printer plotter of some \$20,000+.



The machine will allow students of Mr. Lawrence's and Mr. Schwendau's classes to practice rapid prototyping whereby a 3-D CAD model done early in the day can be actually modeled out of plastic later in the day.

Schwendau said, "Bob and I have wanted one of these for many years. Now, with a current combination of rising enrollments and political initiatives supporting STEM (Science Technology Engineering Math) education and we are about to have a dream come true!" The two programs will share use of the machine with AET making use of it in scheduled fall courses and CAD making use of it in spring courses.

*continued on page 3*

## Sign Up Early for CAD!

Of these CAD courses offered this fall, only CAD152, CAD251 and CAD270 have a prerequisite requirement to be met before they may be taken.

See the college catalog either online or in hard copy for further information. Not following our two year, four semester, CAD program planner and expecting to graduate within two years is not possible. Please be sure to visit with a guidance counselor or your program instructor when making up your college schedule to avoid scheduling issues in the future.

Both CAD106, CAD110 and CAD151 are designed as friendly entry points into the CAD program for prospective students to test the waters. Last year the CAD Technology program ran two sections of the newly redesigned CAD110 Orientation to CADD course. ❖

## Donations Received!

And we are so very grateful.

We wish to thank Paul Marchese of Marchese and Sons, Inc., of Roselle, Illinois, for their donation of a Xerox 2510 Engineering Copier this semester. We also wish to thank Fire By Designs, Inc., of Lake Villa, Illinois, for their donation of \$500 in rolls of plotter bond paper. ❖



*Instructor Mark Schwendau with almost a mile of plotter bond paper for the CAD Technology program.*

## New CAD Video Promo!

It's HD, professionally scripted, and AWESOME!



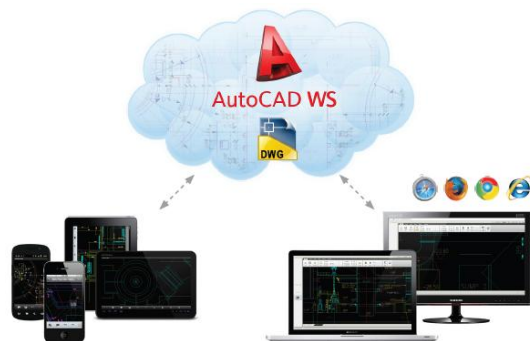
*Shawn Balch models a program t-shirt of 2012 next to a banner from the 2011 t-shirt design.*

There is an old adage, "If you want something done right, do it yourself." With that in mind instructor and students made a promotional video for the KC CAD Technology program, as per a suggestion from the advisory committee. Check it out on the VISITORS page of our website and tell us what you think! ❖

## CAD in Cloud Computing

CAD Technology Students Collaborate Hi-Tech!

On April 17<sup>th</sup> Kishwaukee College CAD Technology students in CAD153 took their design project to the cloud!



AutoCAD WS is a free Work Space, or Web Service, for CAD for designers to upload their drawings and share them in collaborative with design team members to markup and chat about design changes in the drawing real-time. ❖

## Two Spring Fieldtrips?!?

*continued from page 1*

Some 20 students of the spring 2012 semester's CAD Technology courses were treated to two fieldtrips related to the two majors of the CAD Technology program.



We wish to thank Kishwaukee College Vice President Rob Galick for setting up our February 15th tour of our new 21million dollar addition to the college as well as Bill Wilson of Shales McNutt Construction his service as our tour guide!



Then, on April 9th, 20 students of the program toured Caterpillar's Aurora Plant. Special thanks to Dean Caho and those who serve with him. ❖

## Competition Winners

Congratulations goes to Rochelle High School students T.J. Creason, First Place, and Heather Lent, Second Place, in winning Kishwaukee College's 2012 High School Design Competition! Their entries can be viewed on YouTube as TJ's Whirligig and Heather's Whirligig. Thanks is also extended to their instructor, Kurt Wolter, for his extra effort with these students. Details of the competition are on our website. ❖

## New Equipment Coming!

3-D printing, or plotting, allows printing 3-D models in the classroom. The printer can build accurate, functional concept models, rapid prototypes, and product mockups in ivory ABS<sup>plus</sup> thermoplastic right from a 3-D CAD file. The printer contains two material carriers, for plastic filaments of materials fed through tubes from the material bay to a heated print head, where they are liquefied and deposited onto the modeling base to the form of the 3-D CAD model. When printing is done, you simply take the modeling base out of the printer and remove your model. Bases are recyclable. ❖

For more information visit: [www.uprint3dprinting.com](http://www.uprint3dprinting.com)

## Outstanding CAD Student

On April 5<sup>th</sup> Kishwaukee College CAD Technology student Brenton Carroll was selected by faculty as the Outstanding CAD Technology student of 2012.



Brent received a \$250 cash prize from an anonymous donor. He was a lab assistant for the last two years.

On April 28<sup>th</sup>, Brent was also the Gold Medalist in Technical Drafting CAD for Illinois in SkillsUSA and advances to nationals in Kansas City in June. Results of his performance at SkillsUSA Nationals will be posted in the spring newsletter in December. ❖

**A.A.S. Degree COMPUTER-AIDED ARCHITECTURAL DESIGN –#412 - 64 semester hours**

**FALL SEMESTER – FIRST YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD110	Orientation to CADD	1		
CAD111 EGR277	Technical Drafting <u>OR</u> Engineering Graphics / CAD	3		
CAD131	Print Reading for the Construction Trades	3		
CAD151	Fundamentals of CAD-AutoCAD	3		
CAD152	Intermediate Computer-Aided Drafting	3		
SPE100	Oral Communication I	3		
		16		

**SPRING SEMESTER – FIRST YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD112	Technical Illustration	3		
CAD221	Descriptive Geometry	3		
ENG103	Composition I <u>OR</u>	3		
ENG109	Intro to Technical Report Writing			
MAT150	College Algebra <u>OR</u> Higher Level Math	3-4		
CAD154	Advanced CAD Architectural	4		
		16 - 17		

**FALL SEMESTER – SECOND YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD106	Orientation to Consumer Design	3		
CAD251	3-D CAD Modeling/Rendering/Animation	3		
PHY150	Introductory Physics	3		
PHY151	Introductory Physics Laboratory	1		
	Social Science/Humanities Elective	3		
	CAD or CIS Elective	3		
		16		

**SPRING SEMESTER – SECOND YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD254	Computer-Aided Architectural Design	3		
MAT155	Trigonometry	3		
	CAD Elective (153 Suggested)	3-4		
	CAD Elective (231 Suggested)	3		
	CAD Elective	3		
		15 - 16		

*Program planners are also found in the catalog and on our program website.*

**A.A.S. Degree COMPUTER-AIDED MECHANICAL DESIGN –#413 - 64 semester hours**

**FALL SEMESTER – FIRST YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD110	Orientation to CADD	1		
CAD111	Technical Drafting or	3		
EGR277	Engineering Graphics / CAD			
CAD151	Fundamentals of CAD-AutoCAD	3		
CAD152	Intermediate Computer-Aided Drafting	3		
MAT150	College Algebra OR Higher Level Math	3 - 4		
SPE100	Oral Communication I	3		
		16 - 17		

**SPRING SEMESTER – FIRST YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD112	Technical Illustration	3		
CAD153	Advanced CAD/Mechanical	4		
CAD221	Descriptive Geometry	3		
CAD	Elective	3		
ENG103	Composition I OR	3		
ENG109	Intro to Technical Report Writing			
		16		

**FALL SEMESTER – SECOND YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD106	Orientation to Consumer Design	3		
CAD171	Fundamentals of CAD - Solidworks	3		
CAD251	3-D CAD Modeling/Rendering/Animation	3		
PHY150	Introductory Physics	3		
PHY151	Introductory Physics Laboratory	1		
MT215	Manufacturing Processes I	2		
		15		

**SPRING SEMESTER – SECOND YEAR**

COURSE	COURSE TITLE	HOURS	GRADE	TERM COMPLETED
CAD231	Geometric Dimensioning & Tolerancing	2		
CAD253	Computer-Aided Mechanical Design	3		
MAT155	Trigonometry OR			
MT 152	Machine Shop Math II	3		
	Social Science/Humanities Elective	3		
	CAD Elective	3		
	CAD or CIS Elective	2 - 3		
		16 - 17		

*Program planners are also found in the catalog and on our program website.*