

COPY

DATE: March 5, 1981
TO: David Marker and the Status Committee
FROM: Sheldon Wettack
SUBJECT: Recommendation that Herb Dershem be Promoted
to Full Professor

Accompanying this memo are materials gathered by Elliot Tanis in support of a recommendation that Herb Dershem be promoted to Full Professor beginning with the 1981-82 academic year. I strongly support this recommendation and will indicate the basis for my support in the following paragraphs.

For a wide variety of reasons, Herb Dershem has demonstrated in a relatively short time that he is an outstanding Hope College faculty member. This judgment can be made whether one is considering Herb's teaching effectiveness, his scholarly activity, or his service to the College and the community. I will address each of these areas separately.

TEACHING EFFECTIVENESS

Included with the enclosed materials are SIR evaluations from last spring and fall semesters. Professor Tanis has summarized the results obtained from using departmental evaluation forms for the past several semesters on the page immediately following the SIR evaluations. The individual evaluations are available in my office.

As the reader examines this summary and the SIR evaluations, it is easy to conclude that students think highly of Herb as a classroom teacher. In a wide variety of courses Herb is ranked quite high by students. Only in the Computer Science 282 class last spring were the evaluations at all average. I have talked with Herb about that particular class and as the reader can see, the overall percentile rankings are made low by the fact that about three students tended to be negative in their evaluation. Even so, Herb was placed at the 50th percentile level on the "overall" question. In all other classes for which evaluations were obtained, Herb is ranked very high, among the highest in the math/computer science area. It should be noted that the Math Department uses their own form in all of its classes and, therefore, the basis for making that above statement is solid. A review of the student letters obtained by Elliot also demonstrates what students think of Herb as a classroom teacher. It should be noted that, in addition to his effectiveness in a classroom, the students speak highly of what he has done for them in helping them to make and pursue career choices. There is absolutely no doubt in my mind that Herb Dershem is one of our more effective classroom teachers.

2

SCHOLARLY ACTIVITY

Herb's involvement in scholarship is clearly demonstrated by the rather long list of publications and presentations which he has made over the last several years. Included with the materials are a number of the publications which are listed on his vitae. He is an active scholar and has the attitude that his scholarship should be shared with others and, therefore, is an active publisher. In addition to many of the publications of interest to people involved in "popular" computer science, Herb has been involved in producing several pieces of "teaching literature." Finally, as can be detected from the materials and from my statements on John Whittle's recommendation, Herb has played a very important part in the development of John Whittle as a computer scientist over the last several years. Thus Herb's scholarship rubs off on others and John Whittle has been a prime benefactor of this. In my opinion, Herb Dershem has clearly demonstrated through his scholarly activity that he will continue to be a scholar in the years ahead. He has demonstrated that his scholarship is consistent with the rank of Full Professor at Hope College.

SERVICE

There needs to be very little said about Herb's service to Hope College. As one of the prime designers of the Computer Science Department and as its chairperson during the development of the department, Herb has made a very major contribution to Hope College. Our department is now looked upon as a model for computer science education in liberal arts colleges and this is due in no small part to Herb Dershem's presence at Hope College. We are extremely fortunate to have him on our faculty, particularly since there are few academic computer scientists available to begin with.

Beyond his contributions to the College through his departmental chairmanship, Herb is actively involved in a variety of endeavors around the College and has contributed his share of effort to the board and committee structure of the College. It has been my experience that when one has a job to be done that Herb can be asked to do, there is no need to worry about its being done very effectively.

SUMMARY

For the many reasons cited above, I believe Herb Dershem should be promoted to Full Professor. Although he has been at the College only twelve years and has been in rank only eight years and would, therefore, be a "young" Full Professor, he is a person who, I believe, we should reward at this time with promotion. There would be nothing to be gained, in my mind, by waiting until Herb is "older" and much to be gained by recognizing his contributions to the College and to his profession by promoting him now. I strongly urge that the Status Committee act positively on this recommendation.

Statement of five year professional development plans.
Herbert L. Dershem
March 6, 1981

It is difficult for me to project my plans into the next five years for two reasons. First, computer science is such a rapidly changing field that it is difficult to predict what the areas of research will be in five years. Five years ago I would have had no sense of the projects on which I am working now. A second consideration is the overall student load in computer science. Teaching classes with from 60 to 80 students, and serving as advisor to 50 students, and meeting the growing needs to meet with prospective students leaves little time for any development at all.

With those qualifications in mind, here are my projected plans.

1. I will convert and adapt all aspects of the computer science program to the new Hope College computer system.
2. I will work in the area of self-paced instruction through the development of appropriate modules for the introductory computer science course.
3. I will continue developing my expertise in the area of business applications of computers through consulting.
4. I will continue research into the use of microcomputers in education.



HOPE COLLEGE

DEPARTMENT OF MATHEMATICS

Date: January 12, 1981
To: Status Committee
From: Elliot A. Tanis, Chairman
Subject: Recommendation for promotion of Herb Dershem to the rank of Professor of Mathematics and Computer Science.

Herb Dershem has been a member of the Hope College faculty since 1969. He was promoted to the rank of Associate Professor in 1973.

Teaching Effectiveness

Students in both lower and upper level courses generally give Herb very high ratings. In CS 120, Introduction to Computer Science, Herb received average overall ratings of 3.53, 3.94, and 3.60 out of 4.00 during the past three semesters. In four Junior/Senior level courses Herb received average overall ratings of 3.86, 3.57 and 3.94 out of a possible 4.00.

Herb has also taught elementary school children in the QUEST program and teachers in summer workshops. Although I have no hard data, comments that I have heard have been full of praise for Herb's teaching on both of these levels.

Many new courses have been developed in Computer Science during the past several years. Herb played a major role in the development of several of them including Artificial Intelligence, Computer Simulation and Modeling, Computer Laboratory for Introductory Statistics, Algorithms, Hardware and Software Systems, and a Computer Science Colloquium.

The introductory computer science course (CS 120) has undergone several changes including a major change in approach during the past three years. Herb was the director of a grant from NSF under their Local Course Improvement Program. This grant helped the members of the Computer Science Department develop a modular approach for teaching CS 120. Herb will present a paper describing this course at the SIGCSE (Special Interest Group Computer Science Education) Symposium in St. Louis in February.

Herb has also been effective as a teacher for his colleagues. For example, I have had no formal training in computer science. Some aspects of computer science can be learned from text books. However often questions arise for which answers are difficult to find by reading poorly written manuals. Herb was always ready to answer my questions and gave me added understanding.

I would rank Herb as being an exceptional teacher.

Scholarship and Professional Activity

Herb has published a variety of articles during the past several years. These are listed on his resume. Note that his publications include articles for elementary school children, elementary and secondary school teachers, college students and professors. I expect him to continue to write several articles and/or reviews each year.

His research has also involved many of our students. During the 1979-80 academic year he supervised 29 student independent study and research projects. During this past semester he directed 20 student projects.

His work at Hope College has also attracted national attention. National interest has been expressed in Hope's Computer Science major program, the modular introductory computer science course (CS 120), and the use of the computer in statistics. He has also been invited to participate in workshops and serve as a consultant. For example, at a conference at St. Olaf College last fall, Herb spoke on the "Role of the Computer Science in the Mathematics Curriculum".

Herb was also selected to design a seminar on PASCAL sponsored by the McGraw-Hill Seminar Center for professional development. He wrote a workbook for this seminar.

Although I am listed as the director of an NSF Instructional Scientific Equipment Program grant under which we set up a microcomputer lab, I look on Herb as a co-director. We wrote the proposal together and he could just as well have been listed as Director.

Service

Because of the staff changes in computer science, Herb has had a large number of advisees, including 50 this year.

Herb has been active in introducing the computer in the local schools. He has offered workshops for area teachers and has generously contributed his time.

Herb is an active member of the Zion Lutheran Church

I regard Herb's service as excellent.

Summary

I believe that Herb satisfies all of the criteria for promotion to the rank of Professor.

1. Hope College is indeed fortunate to have a Computer Scientist who holds a Ph.D. degree.
2. His superior ability as a teacher has been well demonstrated.
3. His record of scholarly activities has earned him a national reputation within his profession.
4. As computer science has grown, Herb has also grown professionally, kept up with changes, and has been a leader in implementing changes.
5. His life style gives evidence of sympathy toward the purposes of Hope College.

I hope that I have included sufficient evidence to support my strong recommendation that Herb Dershem be promoted to Professor of Mathematics and Computer Science.

Respectfully submitted,

Elliot A. Tanis

Elliot A. Tanis
Chairman

Date: January 24, 1981

To: Status Committee

From: Elliot Tanis

The following persons are able to judge Herb Dershem's professional competence.

Professor Richard Allen
St. Olaf College
Northfield, MN 55057
507-663-2222

Professor David Smith
Duke University
Durham, NC 27706
919-684-2321

Professor John Wenzel
Albion College
Albion, MI 49224
517-629-5511

Mr. Pete Trotter
CONDUIT
University of Iowa
P.O. Box 388
Iowa City, IA 52240
319-353-3170



HOPE COLLEGE

DEPARTMENT OF MATHEMATICS

February 6, 1981

Status Committee
Hope College
Holland, MI 49423

Dear Committee Members:

This letter is to support the recommendation of Herbert Dershem for promotion to Full Professor.

I have worked closely with Herb over the last several years as a member of the Computer Science Department and have found him easy to work with. He has given real leadership, as department chairman, to the development of a Computer Science curriculum which is recognized by many educators and Computer Science professionals as an excellent and unique program for a liberal arts school.

As department chairman he encourages and helps members of the department to expand their knowledge and expertise in new areas of Computer Science since it is such a rapidly changing area.

I have sat in on several of Herb's upper level classes. He has excellent rapport with the students, he is very demanding of the students and yet is able to motivate them to work hard in his classes. I would rate him in the top 10% of all the teachers I have come in contact with during my student and teaching years.

In conclusion I recommend him for this promotion without any reservations.

Sincerely,

John Whittle
Assistant Professor

Self Evaluation and Goals

1980

Herbert L. Dershem

TEACHING EFFECTIVENESS

My teaching effectiveness has continued to improve over the past year. The student evaluations of my introductory level courses have remained at the same level as in other years, but student evaluation of upper level courses has been higher than ever before. In the two Junior/Senior level courses that I taught I received an average overall rating of 3.88 and 3.94 out of a possible 4.00. I also developed a number of new courses including a course on Algorithms, and continued development with John Whittle of Computers in Education. I also developed several new modules for the Introductory course and taught Business Information Systems for the first time. I also provided leadership for a one-hour colloquium in the department.

SCHOLARSHIP AND PROFESSIONAL ACTIVITY

Included among my professional activities of the past year has been the publication of two papers, two modules, and a state of the art report. I was also selected to design a seminar for Seminar Development Corporation, for which I wrote a workbook. If the project which I submitted as a proposal to the Student Science Training Program of NSF is funded, it will have a significant impact on our program here at Hope College.

I supervised a total of 20 independent study and research projects in the department. Because of the large number of such projects, I feel that their quality is not as high as it has been in the past. But students have been involved in my research in a significant way, especially in the area of microcomputers.

My work here at Hope College has attracted attention nationally in the past year. National interest has been expressed in our Computer Science major program, the modular course which we have developed, and in the use of the computer in statistics. I have been invited to participate in workshops and serve as a consultant on the basis of all of these involvements.

SERVICE

My advising load has been very heavy in the past year including serving as advisor to 20 Freshmen. I have continued to be involved with the introduction of computers into the local schools and with the development of the local microcomputer users' group. I have also given many talks and served as consultant to many local businesses and industries.

GOALS FOR 1981

1. I will convert and adapt all aspects of the computer science program to the new Hope College computer system.
2. I will work on the introduction of self-paced modules into the Introductory course.

JANUARY 1, 1980 thru DECEMBER 31, 1980

FACULTY SERVICE TO HOPE COLLEGE

Name Herbert L. Dershem

[Please typewrite]

A. SCHEDULED TEACHING - Courses (see notes below)

	Dept. & No.	Credit Hours	Course Description	Formal Contact Hours	Other Contact	Enrollment
SPRING SEMESTER MAY & JUNE TERMS January - June, 1980	Comp Sc 795	2	*Computers in Education	2	0	23
	Comp Sc 100	2	*Comp for Liberal Arts	2	0	19
	Comp Sc 120	3	*Intro Comp Sci	4	0	74
	Comp Sc 495A	1	✓Comp Sci Colloquium	1	0	6
	Comp Sc 495B	3	✓Algorithms	3	0	16
	Comp Sc 282	3	Comp & Prog Organization	3	0	26
	(Comp Sc 100/120 team taught with J. Whittle and H. Leland Comp Sc 795 team taught with J. Whittle)					
FALL SEMESTER SUMMER SESSION July - December, 1980	Comp Sc 795A	2	*Computers in Education	2	0	22
	Comp Sc 795B	2	*Computers in Education	2	0	20
	Comp Sc 491	3	Internship	1	0	5
	Comp Sc 100	2	*Comp for Liberal Arts	2	0	14
	Comp Sc 120	3	*Intro Comp Sci	4	0	104
	Comp Sc 320	3	✓Business Info Systems	3	0	17
	Comp Sc 491	3	Internship	0	1	3
	Math 212	1	Intro Stat Lab	2	0	9
(Comp Sc 795 team taught with J. Whittle, Comp 100/120 team taught with J. Whittle and J. Boes)						

- Notes: 1. For team-taught courses, please place an asterisk (*) before the course description and list other members of the team immediately under the course description.
2. If this is the first time you have taught a listed course, please place a check (✓) before the course description.

B. ACADEMIC ADVISING

Total number of advisees 50
Majors 16
Fresh./Soph. 26

C. SCHOLARLY ACTIVITY (List)

- Scholarly Work Supported by Outside Funding (list both project description and source of funding)
CONDUIT Series Editor, CONDUIT
Project to develop modular course, National Science Foundation
Local Course Improvement Project.
St. Olaf Panel on Mathematics Curriculum, NSF CAUSE grant to St. Olaf.
- Other Scholarly Work and/or General Professional Development
Attended ACM Sigcse Symposium, Feb. 12-15. .
Developed two UMAP modules
Attended Personal Computee Show, Chicago, Oct. 17.
Publications - see attached sheet.
Reviewed 4 papers for National Educational Computer Conference
and one proposal for NSF
Wrote article on CONDUIT for Michigan Section MAA Newsletter.
Wrote proposal to Student Science Training Program, NSF.
Assisted in preparation of Hope Essentials English List

[over]

D. INTERNAL SERVICE

	Check (✓) Activity	Total Number of Students	Number of Students Enrolled For Credit
1. <u>Student Oriented</u>			
Supervision of independent study or research	✓	20	20
Directing a play	_____	_____	_____
Recitals	_____	_____	_____
Coaching	_____	_____	_____
Other (describe)	_____	_____	_____
2. <u>Administrative</u> (List)			
Chairman of Department of Computer Science			
3. <u>Board and Committee Assignments</u> (List)			
Member of Computer Selection Committee.			
4. <u>Departmental Assignments</u> (List)			
Advisor to ACM Student Chapter, Spring, 1980			

E. PUBLIC SERVICE/CONSULTING (List)

Consultant to: Cambridge Publishing Company, Atmosphere Processing, Holland Public Schools, Peerbolt's, Herman Miller, St. Olaf College, Ithaca College, Aquinas College, Fris Office Supplies, A.O. Smith.

F. OTHER (course and curricular development, lectureships, seminars, presentations, to high school students, etc.)

Talks given to Ottawa County Bar Association, Hope College Winter Homecoming, Albion Computer Fair, Plymouth Christian School, Holland-Zeeland Data Processors, Exchange Club, Muskegon Area In-Service Conference, Ottawa Area FEP Conference, and three talks to Hope College ACM Chapter.

Signature: Hubert L. Decker

Date: 12-29-80

[Please, black ink only]

Publications, 1980

Herbert L. Dershem

Published in 1980

"Computers in Teaching Mathematics and Statistics: A State of the Art Report", with D. Smith, CONDUIT, 1980.

"Using Computer Games to Challenge Elementary School Students", The Computing Teacher, 7,5(Apr/May, 1980), pp. 32-34.

"Recursive Programming in BASIC", Digital Design, 10,7(July, 1980), pp. 20-24.

"Computer Problem Solving", Educational Development Center, Project UMAP, 1980.

"Iteration and Computer Problem Solving", Educational Development Center, Project UMAP, 1980.

Written in 1980

"A Modular Introductory Computer Science Course", to appear in SIGCSE Bulletin.