Richard von Mises †

Am 14. Juli d. J. ist der Professor der Ärodynamik und Angewandten Mathematik an der Harvard Universität, Richard von M i s e s, nach längerer schwerer Krankheit in Boston (Mass.) verschieden.

Kennzeichnend für R. v. Mises, der 1883 in Lemberg das Licht der Welt erblickt hatte, war seine Gründlichkeit und Vielseitigkeit. Es gibt wohl kaum einen Zweig der angewandten Mathematik, dessen Entwicklung er nicht richtunggebend beeinflußt hätte. Schon als junger Student der Technischen Hochschule in Wien publizierte er auf geometrischem Gebiet. Als Assistent G. H a m e l s kam er an die Deutsche Technische Hochschule in Brünn, wo er sich für Mechanik habilitierte, um bald darauf, 1909, im Alter von 26 Jahren, als außerordentlicher Professor an die Universität in Straßburg berufen zu werden. Während des ersten Weltkrieges war Mises am Fliegerarsenal der Österreichisch-Ungarischen Armee als Organisator, Konstrukteur und Lehrer tätig. Nach seinem Entwurfe entstanden damals das erste Großflugzeug und auch die Anfänge seiner später in Buchform herausgegebenen „Fluglehre". Nach kurzer Lehrtätigkeit in Frankfurt und in Dresden wurde Mises 1920 ordentlicher Professor und Direktor des Institutes für Angewandte Mathematik an der Universität Berlin, wo er bald nach seiner Berufung die Zeitschrift für Angewandte Mathematik und Mechanik" ins Leben rief und einen Kreis von später äußerst erfolgreichen Schülern um sich sammeln konnte. 1933 übersiedelte er als Professor der Reinen und Angewandten Mathematik an die Universität Istanbul und wurde 1939 als Professor an die Harvard University in Cambridge berufen.

Sein gemeinsam mit Ph. F r a n k herausgegebenes zweibändiges Werk „Differential- und Integralgleichungen der Mechanik und Physik, ebenso sein zweibändiges Lehrbuch „Wahrscheinlichkeitsrechnung und ihre Anwendungen" sind Standardwerke, die mehrere Auflagen erlebten und in verschiedenen Sprachen übersetzt wurden. In die Allgemeine Mechanik griff Mises durch die Entwicklung der

gen". — In den letzten Jahren hat sich Hamel im Anschluß an seine Untersuchungen über die Grundlagen der Mechanik auch allgemein mit den Grundlagen der Physik beschäftigt und zu diesem schwierigen und heute noch vielfach umstrittenen Gebiet interessante Beiträge geliefert.

Mögen dem ausgezeichneten Forscher und verehrungswürdigen Kollegen noch viele Jahre geistiger Frische und fruchtbarer Arbeit beschieden sein! *W. Schmeidler (Berlin).*

UNION NEWS

Annual report of the Executive Committee

to the National Adhering Organizations By-Laws, 1—7; concerning the period: March 9, 1952 — February 14, 1953.

1. ADMISSION OF IMU TO ICSU.

During the sixth General Assembly of the International Council of Scientific Unions (ICSU) held in Amsterdam, October 1—3, 1952, the application for adherence of the International Mathematical Union (IMU) was accepted: IMU was classified as a „general Union" (three votes).

The Officers of ICSU elected at the Amsterdam meeting are as follows: President: *B. Lindblad*, Stockholm; Vice-Presidents: *H. Solberg*, Oslo; *E. Herbays*, Bruxelles; General Secretary: *A. V. Hill*, London; Treasurer (an office created by the new Statutes): *W. A. Noyes Jr.*, Rochester, N. Y.; Ordinary members: *J. Pérès*, Paris; *N. Kameyama*, Tokyo; and the retiring President *A. Von Muralt*.

Besides the first Vice-President of IMU, Professor *Borel*, who was present at the ICSU General Assembly, the delegates of IMU, after its admission to ICSU, were *E. Bompiani* and *B. Jessen*.

The next meeting of the Executive Board of ICSU will take place in Strasbourg, July 1953. Delegates of IMU will be Professors *E. Borel* and *E. Bompiani* (or *B. Jessen* as alternate).

The following grants from UNESCO through ICSU have been obtained for 1953 (seventh General Conference of UNESCO in Paris):

C. 1.	Organizational expenses.		NONE
C. 2.	News Bulletin, Directory of Mathematicians	. . . . .	$ 1.500
C. 3.	Executive Committee, Commissions	. . . .	$ 3.500
C. 4.	Symposia	. . . .	$ 2.500
			$ 7.500

(For the allocation of this sum see Section 6 below.)

Grants for 1954 will be settled at the Strasbourg meeting of the Executive Board of ICSU.

The Executive Committee takes great pleasure in acknowledging the cordial relations which existed, also before the admission of IMU to ICSU, with the retired Secretary of ICSU, *F. J. M. Stratton*, and the friendly assistance and invaluable help given to IMU since its inception by Dr. *R. Fraser*, in his capacity as Liaison Officer ICSU—UNESCO.

2. ADHERENCES.

Sweden has been accepted as a member of IMU as of September 1, 1952, in Group I (one).

As already communicated to the adhering organizations, the National Adhering Organization for Sweden is the Swedish Academy (Mathematics Section); the National Committee for Mathematics is as follows:

A. Wiman, F. Carlson, M. Riesz, A. Beurling (Chairman), *T. Nagell, A. Pleijel* (Secretary), *O. Frostman, L. Gärding.*

An application (Dec. 17, 1953) for admission to IMU in Group I (one) has been received from Mexico (Professor *Napoles Gandara*, President of the Sociedad Matematica Mexicana).

The National Adhering Organization for Mexico will be the Sociedad Matematica Mexicana; the National Committee for Mathematics will be as follows:

Dr. *José Adem Chahin*, Dr. *Alfonso Napoles Gandara*, Dr. *Guillermo Torres Diaz*, Dr. *Roberto Vasquez Garcia, M. en C. Francisco Zubieta Russi.*

An application (Jan. 30, 1953) for admission to IMU in Group III has also been received from India (*D. D. Gupta*, Undersecretary to the Government of India).

The National Adhering Organization for India will be the Ministry of Natural Resources and Scientific Research; the National Committee for Mathematics will be as follows:

Dr. *H. J. Bhabba* (Chairman); Professors *S. Minakshisundaram, Ram Behari,* members; *K. Chandrasekharan*, Convener and Secretary.

The Executive Committee after having examined the credentials and the scientific standing of the applicants, has unanimously moved to recommend to the National Adhering Organizations the acceptance of Mexico in Group I and of India in Group II.

A postal ballot is under way: its dead-line is June 30, 1953.

Other applications are likely to come.

3. DELEGATIONS NAMED TO ATTEND CONGRESSES:

Following kind invitations received, IMU has been represented by Delegates appointed by the President to the meetings of mathematical interest listed hereafter:

a) General Assembly and Congress of IUTAM (International Union for Theoretical and Applied Mechanics); Istambul, Turkey, August 20—28, 1952.

Professors *Courant, Pérès, Signorini.*

b) Congress of the Deutsche Mathematiker Vereinigung, Munich, Germany; September 5—8, 1952.

Professors *Knopp, Godement.*

c) Congress of the Österreichische Mathematische Gesellschaft, Salzburg, Austria; September 9—14, 1952.

Professors *Bompiani, Davies, Denjoy, Kamke, Morse* (Representative of the President)

4. SECRETARIAT.

The Secretariat of the Union has been organized in the Istituto Matematico, Città Universitaria - *Roma* (Italy), which is the official address of the Union.

The office of the Secretariat, as well as its lighting and heating, the use of the telephone, part of the furniture and the use of mimeographing machines is offered freely by the Mathematical Institute of the University of Rome.

The personnel of the Secretariat consists of a polylingual Secretary (typist) and of occasional additional help for the administration and general services.

The following documents have been printed and widely circulated (to adhering Organizations, members of the National Committees for Mathematics, prospective members of IMU, ICSU and other Unions): Statutes and By-laws (English text and French text); record of the first Assembly in Rome, March 6—8, 1952: list of member Countries, their National Adhering Organizations and

National Committees for Mathematics; President Stone's report on the Union to the U. S. Department of State.

Three bank accounts for IMU have been opened at the following Banks:

The Chase National Bank — New York, USA.
Banca Nazionale del Lavoro — Roma, Italy.
Société Générale — Paris, France.

The existence of three different accounts in three different currencies fulfils the following purposes: to make it easier for the various nations to make their payments in the currencies they prefer; to provide funds for immediate disposal without exchange procedure; to avoid as much as possible in exchange. This procedure, adopted also by other Unions, implies the necessity of carrying on accounts in three different currencies; an overall picture of the financial situation of the Union can only be obtained by the adoption of an approximate rate of exchange ($ 1 = It. Lire 620 = Fr. francs 350).

5. COMMISSIONS.

In accordance with the resolutions of the General Assembly, the following Commissions have been established and organized.

a) International Commission on the Teaching of Mathematics:
Honorary President, Professor *Fehr*; President: Prof. *A. Châtelet*; Vice-Presidents: Prof. *D. Kurepa, S. Mac Lane*; Secretary: Prof. *H. Behnke*; Member: Prof. *R. L. Jeffery*

b) Commission for a World Directory of Mathematicians:
Chairman: Prof. *M. Stone*; Members: Prof. *R. Berker, M. Brelot, R. Inzinger.*

c) Commission on the Dissemination of Mathematical Knowledge:
Chairman: Prof. *I. Pérès*; Members: Prof. *W. V. D. Hodge, S. Mac Lane, H. L. Schmid.*

d) Commission on the Exchange of Mathematicians:
Chairman: Prof. *B. Jessen*; Members: Prof. *A. Châtelet, H. Davenport, J. R. Kline, K. Kunugi.*

e) Commission for a Directory of Mathematical Symbols:
Chairman: Prof. *H. L. Schmid*; Secretary: Prof. *G. Sansone*; Members: Professors *H. Cartan, G. Temple.*

f) Commission on Abstracting and Reviewing:
Chairman: Prof. *W. V. D. Hodge*; Members: Prof. *E. Hille, J. Pérès, H. L. Schmid*; Consultants: Prof. *R. Berker, C. Kuratowski.*

a) A meeting of the Commission on the Teaching of Mathematics was held in Geneva, October 20, 1952; attended the meeting: *Behnke, Châtelet, Fehr*; *Hille* (replacing *Jeffery*), *Kurepa* and Professor *Wemger*, Dean of the Faculty of Sciences.

After the formation of the Governing Board (as given above), and a short review of the history of the Commission Internationale pour l'Enseignement Mathématique, it was decided to ask the National Mathematical Committee of each nation adhering to the IMU to name a representative to the Commission who would be responsible in his own country for the constitution of a national subcommittee made up of representatives of the various schools and levels of teaching (primary, secondary, professional, technical schools and university departments). The Commission will get in touch with the subcommittee in each country through the member named from the National Mathematical Committee.

The Governing Board was enlarged by cooptation of Professor *S. Mac Lane*, elected Vice-President; it was also agreed to ask the British, Italian and Danish National Committees for Mathematics each to name a Delegate to the Governing Board.

Offical languages of the Commission will be: English, French, German, Italian; of the Governing Board: English and French.

It was agreed to adopt the periodical: „L'Enseignement Mathématique" as the official organ of the Commission.

Budgetary problems were also discussed to cover the expenses of the Commission, to help „L'Enseignement Mathématique" and to publish a book in cooperation with UNESCO.

The following subjects study have been suggested:

1. The Rôle of the Contemporary Mathematician (with reports to be made to the General Assembly of IMU and to the International Congress).

2. Comparative Study of Textbooks in Different Countries (in collaboration with the International Bureau of Education).

3. Comparative Study of the Curricula in Secondary Education

4. The Interrelations of the Various Branches of Mathematics (Algebra, Geometry, Descriptive Geometry)

5. Mathematical Methods (Inductive, Descriptive, Graphic Inductive and Graphic Descriptive Methods).

Informal reports have been received from the other Commissions. From these reports the following items may be noted (the same index letter is used as for the Commission).

b) The possibilities have been examined for the publication of a Directory of Mathematicians by the Union itself or by arrangement with a commercial firm.

The first type of publication would include only names, addresses, and possibly present academic positions; the second type would be more complete (including also past academic positions, lines of research, a list of Mathematical Societies and of mathematical jourals).

c) Recent methods of printing, substantially different from the classical printing procedures, have been surveyed: the reduction of cost is of about 20% and there is also a considerable reduction of time.

d) The exchange of mathematicians would be facilitated by an *ad hoc* publication showing the existing opportunities for a period of study or scientific research in foreign country in mathematics (a similar UNESCO publication is too large for convenient use, and not all inclusive; new opportunities always arise).

It would be useful to establish regional information centers, gathering and rapidly distributing information about visiting mathematicians from other regions to make it possible for universities to invite them.

A central bureau gathering information about existing possibilities and willingness to invite visiting lecturers on one hand, and in which individuals desirous to spend a year or a semester in foreign institutions might register themselves on the other hand, might help in establishing useful contacts.

e) A plan has been outlined for a Directory of Mathematical Symbols, stating the languages to be used, the mathematical subjects by which the symbols should be divided, suggesting the indexing of a complete bibliography and referring to some of the previous dictionaries of this sort. Also cooperation with IUTAM (International Union for Theoretical and Applied Mechanics) has been suggested.

f) The establishment of an ICSU Abstracting Committee suggests the possibility of helping, through this Committee, the Mathematical Reviews. Considerable correspondence among members of the Commission has been devoted to possible methods of cooperation between the Mathematical Reviews and the Zentralblatt; although little progress has been made, some constructive suggestions have emerged.

6. EXECUTIVE COMMITTEE MEETING.

The first meeting of the Executive Committee was held in Paris, February 13—14, 1953, at the Institut Poincaré in rooms put at the disposal af the Committee by the courtesy of the University of Paris.

Present at the meeting: President *Stone*, First Vice-President *Borel*, Second

— 7 —

Vice-President *Kamke*, Secretary *Bompiani* and the members: *Hodge, Iyanaga, Jessen*.

Invited attendants to different sessions of the meeting (in relation with the subjects to be discussed) were: Dr. *Wang*, of UNESCO, Dr. *Fraser*, liaison officer ICSU-UNESCO, Professors *Koksma, Kloosterman, Châtelet, Fréchet, Pérès*.

A luncheon and a reception were offered by the University of Paris, so giving a welcome opportunity to the members of the Committee to meet their French colleagues.

The Executive Committee was glad to receive the applications of Mexico and India already referred to (see n. 2) and to recommend their acceptance to the General Assembly (by postal ballot — Statutes III, 11).

It was left to the President to set up an Auditing Commission.

After having received reports from the Commissions, the Executive Committee adopted the following resolution:

Without any committment as to financial support, the Executive Committee approves the proposal of the International Commission of the Teaching of Mathematics to adopt „L'Enseignement Mathématique" as its organ of publication.

On negotiations with the Österreichische Mathematische Gesellschaft for the publication of an international mathematical News Bulletin, as authorized by the General Assembly (see record of the G. A., minute 9), the Executive Committee received a report from the President, and in the light of the position reached in the discussion between the President and Professor *Inzinger*, voted as follows:

„It was agreed to place at the disposal of the President of the Union a sum not exceeding $ 500 to be used during 1953 for the purpose of the News Bulletin; and it was agreed to leave over, for the present, consideration of the allocation for the News Bulletin in 1954".

The problems of the next international Congress of Mathematicians were discussed with Dutch Mathematicians of the Organizing Committee.

The Congress will take place at Amsterdam, September 2—9, 1954.

The two following resolutions have been adopted by the Executive Committee.

„It was agreed to support the organization of three Symposia to be held at the International Congress of 1954, with funds obtained for Symposia from ICSU, on topics to be selected by the organizers of the Congress."

„The Executive Committee puts on record its intention of applying to ICSU for $ 5000 for 1955 for the publication of the Proceedings of the 1954 Congress."

In connection with the date of the Amsterdam Congress, the following resolution has been also adopted:

„The Executive Committee will meet August 30, 1953, and the General Assembly of the IMU will meet August 31 and September 1, 1954 in the Hague."

In accordance with articles 1, 2 of the By-laws, *proposals of business to be transacted at meetings of the next General Assembly shall reach the Secretary not later than April 30, 1954.*

Problems on Symposia were considered: it was decided to draw up a report on general principles and procedures to be submitted to the General Assembly in 1954.

The following Symposia for 1953 were agreed upon:

1) Symposium on *Differential Geometry*, to be held in Padua, Bologna, Pisa, September 21—26, 1953, under the joint auspices of these Universities, and IMU;

2) Symposium on *Topological Groups and Their Representation (in Banach spaces)* to be held in the Autumn of 1953 in the United States under the joint auspices of the National Research Council, USA and IMU.

Topics suggested for the Amsterdam Symposia in 1954 are:
1) Asymptotic expansions.
2) Non-associative non-Lie Algebras.
3) Stochastic Processes.

The funds made available for 1953 by ICSU have been divided as follows:

C. 1.	Organizational		NONE
C. 2.	News Bulletin, up to	. . . .	$ 500
	Directory of Mathematicians	. . . .	$ 1.000
		Total .	$ 1.500
C. 3.	Teaching of Mathematics Commission	. . . .	$ 1.500
	Exchange of Mathematicians Commission	. . . .	$ 500
	Other Commission and Reserve	. . . . . .	$ 500
	Executive Committee	. . . .	$ 1.000
		Total .	$ 3.500
C. 4.	Symposium in Italy	. . . .	$ 1.000
	Symposium in USA	. . . .	$ 1.500
		Total .	$ 2.500

7. FINANCIAL.

On the basis of 61 unit contributions ($ 3965) the following expenditures were authorized by the First General Assembly (see record, minute 22) for the years 1952, 1953:

Secretarial help	. . . .	$ 1.500
Office expenses	. . . .	$ 500
Travelling expenses of the Executive Committee	. .	$ 750

The following financial report covers the period March 10 — December 31, 1952.

Actually the adhering Organizations of the following countries paid their dues for 1952 in 1952 (units of contribution are indicated in parenthesis after the name of the country):

Argentina (1), Australia (1), Austria (1), Belgium (3), Canada (2), Cuba (1), Denmark (2), Finland (1), France (5), Germany (5), Great Britain (8), Greece (1), Italy (5), Japan (5), Netherlands (2), Norway (1), Pakistan (2), Switzerland (2), United States of America (8).

Considering all contributions as paid in USA dollars and not considering banking expenses and change of currencies losses this is equivalent to 56 unit contributions or $ 3651,20.

To this income the following sums are to be added:

1) A reliquat of Fr. frcs. 108.065 of the old International Mathematical Union was presented as a gift, by the courtesy of Prof. G. Valiron, to the present Union (and accepted, according to Statute IV, 17); this is approximately equivalent to $ 350.

2) From the heirs of Prof. *A. Demoulin*, through the courtesy of Prof. *A. Lembrecht*, a sum of Belgian Francs converted by the Banca Italiana del Lavoro in It. lire 6.514 has been received; this is approximately equivalent to $ 100.

3) From Prof. *B. Jessen*, from a sale to the University of Copenhagen of office equipment of the Secretariat of the Interim Committee, a sum of Danish crowns converted by the Banca Nazionale del Lavoro in It. lire 401.776, has been received; this is approximately equivalent to $ 648.

The total income in 1952 amounts approximately to $ 4.749, from which banking expenditures should be deducted.

The actual expenses in 1952 can be divided as follows:

Office equipment (It. Lire 202.500, largely covered by Prof. *Jessen's* remittance, approximately equivalent to)	. . . .	$ 327
Secretarial help approximately equivalent to	. . . .	$ 1.190
Office expenses (It. Lire 242.002 approximately equivalent to)	. .	$ 390
Travelling expenses of the Executive Committee	. . . .	$ —
	Total .	$ 1.907

It is to be noted that these expenses remain much below those approved by the General Assembly (and also to the 10.6/12 of them corresponding to the period March 10 — December 31).

New members of the International Mathematical Union

Following applications for membership in the International Mathematical Union from Mexico (December 17, 1952) and India (January 30, 1953), consequent upon the recommandation of the Executive Committe and the unanimous acceptance of the voting member Nations of the International Union, as of July 1, 1953, Mexico has become a regular member of the Union in Group I (one) and India in Group III (three) .

The National Adhering Organizations and the National Committees for Mathematics are as follows:

<div align="center">MEXICO (Group I)</div>

NAO: *Sociedad Matematica Mexicana*, Tacuba 5, Mexico 1, D. F.
NCM: Dr. *José Adem Chahín*, Dr. *Alfonso Nápoles Gándara* (President), Dr. *Giullermo Torres Diaz*, Dr. *Roberto Vasquez García*, M. en C. *Francisco Zubieta Russi*.

<div align="center">INDIA (Group III)</div>

NAO: *Ministry of Natural Resources and Scientific Research*, Central Secretariat, New Delhi.
NCM: Dr. *H. J. Bhabha* (Chairman), Prof. *S. Minakshisundaram*, Prof. *Ram Behari*, Prof. *K. Chandrasekharan* (Convener and Secretary).

<div align="center">

Enrico Bompiani
Secretary of the
International Mathematical Union

</div>

Internationale Mathematische Unterrichtskommission (IMUK)

Die IMUK — 1908 in Rom anläßlich des Internationalen Mathematikerkongresses begründet — wurde im März 1952 bei der ersten Generalversammlung der Internationalen Mathematischen Union in Rom in die Union eingegliedert. Damals wurden H. B e h n k e (Deutschland), A. C h â t e l e t (Frankreich), R. L. J e f f e r y (Canada) und G. K u r e p a (Jugoslawien) zu Mitgliedern der Kommission gewählt.

Die erste Sitzung der Kommission fand am 20. und 21. 9. 1952 in Genf statt. Anwesend waren: H. F e h r und alle Mitglieder außer Jeffery, der durch E. H i l l e vertreten wurde. Die Tagesordnung der Sitzung betraf: Konstitution und Erweiterung der IMUK, Budget, Organisation der Arbeit, Zusammenarbeit mit dem BIE (Bureau International d'Education, Genf). Fehr wurde zum Ehrenpräsidenten, Châtelet zum Präsidenten, Kurepa zum Vizepräsidenten und Behnke zum Sekretär gewählt. S. Mac L a n e (USA) wurde kooptiert und als Vizepräsident vorgeschlagen. Italien, England und die Skandinavischen Länder sollen je einen Delegierten vorschlagen, so daß die IMUK insgesamt neben Fehr und Stone 8 Mitglieder zählt. Das Budget wurde in der Höhe von 1900 $ veranschlagt. Die Zeitschrift „L'Enseignement Mathématique" bleibt weiterhin das Organ der IMUK. Die Nationalen Unterkommissionen der IMUK (bestehend aus 3—4 Mitgliedern) sollen möglichst bald organisiert werden. Es wurde beschlossen, auf dem nächsten Internationalen Mathematikerkongreß im Herbst 1954 in Amsterdam folgende Berichte zu erstatten: 1) Bericht über den mathematischen Unterricht der 16—21jährigen in den verschiedenen Schulgattungen. 2) Bericht über die Rolle der Mathematik und des Mathematikers im heutigen Leben. — Bei einer Sitzung im Amt der BIE mit H. F i s c h e r wurde engste Zusammenarbeit der beiden Organisationen beschlossen.

An der Pariser Sitzung am 21. 2. 1953 waren noch anwesend: M. S t o n e, Präsident der IMU, Le L i o n n a i s seitens der UNESCO.

Neue Mitglieder: G. A s c o l i (Italien), A n d e r s s e n (Dänemark, nicht anwesend); der englische Delegierte wurde noch nicht designiert. Mac Lane wurde zum Vizepräsidenten und Ascoli zum Kassier gewählt. — Die bei der Genfer Sitzung genannten Themen wurden bestätigt, überdies wurde die Mithilfe der UNESCO und des Musée Pédagogique (Paris) für eine Ausstellung von Lehrbüchern und Schülerprogrammen anläßlich der Amsterdamer Tagung zugesagt. Im April 1954 soll in Genf eine von den einzelnen nationalen Unterkommissionen beschickte Vorbesprechung stattfinden. Das Budget wurde in der Höhe von 1500 $ genehmigt.   *G. Kurepa (Zagreb).*

RAPPORTS - BERICHTE - REPORTS
Kolloquium über Rechenanlagen
Göttingen, 19.—21. März 1953.

Das von über 200 Teilnehmern besuchte Göttinger Kolloquium, das auf die verschiedensten Fragen einging, die mit dem Bau von Rechenanlagen und deren praktischem Einsatz verknüpft sind, bewies in 24 Vorträgen und angeregten Diskussionen das weite Interesse, das diesen Dingen heute in Deutschland entgegengebracht wird. Außer den Fragen der angewandten Mathematik sind es im wesentlichen die der Programmierung, mit denen sich der Theoretiker beschäftgt, während den Konstrukteur von Rechenmaschinen wieder die Bauelemente interessieren, die nach logisch-mathematischen Vorschriften arbeiten.

A. W a l t h e r (Darmstadt), H. u. R. P i l o t y (München) und H. B i l l i n g (Göttingen) gaben eine Übersicht über die Leitgedanken der Entwicklung von Rechenanlagen an den drei westdeutschen Zentren. Über die Verwendung von Maschinen zur Behandlung mathematischer und physikalischer Aufgaben sprachen L. B i e r m a n n (Astrophysik), A. S c h l ü t e r (Wellengleichungen) und S. v. H o e r n e r (Lineare Gleichungssysteme); H. K. D e t t m a r regte den Bau einer Sondermaschine für mehrdimensionale Fourieranalyse an. Weitere Vorträge befaßten sich mit Programmierungsproblemen; hervorgehoben seien die Ausführungen von H. R u t i s h a u s e r (Zürich) über automatische Rechenplanfertigung. Detailberichte gingen teils auf einzelne Bauteile, teils auf fertige Anlagen ein; die Göttinger Maschinen G1 und G2 sowie die Z5 der Zuse-K. G. (Neukirchen) standen zur Besichtigung zur Verfügung.

Die Vorträge des Göttinger Kolloquiums sind gedruckt erhältlich beim örtlichen Tagungsleiter Prof. L. B i e r m a n n, Max-Planck-Institut für Physik, Göttingen, Böttingerstraße 4.   *W. Fromme - H. Pösch (Weyl/Rhein.)*

Mathematisch-naturwissenschaftliche Unterrichtstagung
Münster in Westfalen, 7.—11. April 1953.

Die 44. Hauptversammlung des Deutschen Vereins zur Förderung des mathematischen und naturwissenschaftlichen Unterrichtes in Verbindung mit der 19. Tagung zur Pflege des Zusammenhanges zwischen Schule und Universität an der Westfälischen Wilhelms-Universität in Münster vereinte etwa 800 Studienräte und Professoren der Fächer Mathematik, Physik, Chemie und Biologie. Im Barockschloß, das nach Kriegsende im Inneren großzügig umgebaut worden ist und heute der Mathematisch-naturwissenschaftlichen Fakultät der Universität Münster den würdigen Rahmen bietet, fanden die Vorträge der mathematisch-physikalischen Abteilung statt, während die Vorträge der chemisch-biologischen Abteilung in anderen Universitätsinstituten abgehalten wurden.

In jeder Abteilung wurden ungefähr 40 Vorträge dargeboten, die teils wissenschaftlichen oder fachphilosophischen Themen, teils Fragen der Erziehung und