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No. 3

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The period covered is the first quarter of 1971, and includes all laser-related articles received by us in that interval. The structure and selection criteria are the same as used in the first report.

Somewhat broadened selection criteria have been used for items pertinent to chemical lasers, in view of the expanding possibilities in this technology. Our literature search also reveals an increased emphasis on holographic studies, as well as on uses of stimulated Raman scattering effects in spectroscopy. Other items worthy of mention are two articles on ultraviolet lasers and one on use of an argon ion laser for under water tv transmission.

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## **NOTE:**

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**Stuart G. Hibben  
Project Scientist**

BIBLIOGRAPHY OF SOVIET  
LASER DEVELOPMENTS

No. 3, January - March 1971

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### Introduction

This bibliography has been compiled by the staff of Informatics Tisco, Inc. in response to a continuing contractual assignment to monitor current Soviet-bloc developments in the quantum electronics field. Of all material reviewed, the major yield has been from the approximately 30 periodicals which are known to report the most advanced and interesting findings in Soviet laser technology.

The period covered is the first quarter of 1971, and includes all laser-related articles received by us in that interval. The structure and selection criteria are the same as used in the first report.

Somewhat broadened selection criteria have been used for items pertinent to chemical lasers, in view of the expanding possibilities in this technology. Our literature search also reveals an increased emphasis on holographic studies, as well as on uses of stimulated Raman scattering effects in spectroscopy. Other items worthy of mention are two articles on ultraviolet lasers and one on use of an argon ion laser for underwater tv transmission.

An author index is included. All cited sources are available at Informatics Tisco, Inc.

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## I. BASIC RESEARCH

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### III. SOURCE ABBREVIATIONS

DAN ArmSSR	-	Akademiya nauk Armyanskoy SSR. Doklady
DAN BSSR	-	Akademiya nauk Belorusskoy SSR. Doklady
DAN SSSR	-	Akademiya nauk SSSR. Doklady
FAiO	-	Akademiya nauk SSSR. Izvestiya. Fizika atmosfery i okeana
FiKhOM	-	Fizika i khimiya obrabotki materialov
FTP	-	Fizika i tekhnika poluprovodnikov
FTT	-	Fizika tverdogo tela
I-FZh	-	Inzhenerno-fizicheskiy zhurnal
IT	-	Izmeritel'naya tekhnika
IVUZ Fiz	-	Izvestiya vysshikh uchebnykh zavedeniy. Fizika
IVUZ Radioelektr	-	Izvestiya vysshikh uchebnykh zavedeniy. Radioelektronika
IVUZ Radiofiz	-	Izvestiya vysshikh uchebnykh zavedeniy. Radiofizika

<b>KhVE</b>	-	<b>Khimiya vysokikh energiy</b>
<b>KiK</b>	-	<b>Kinetika i kataliz</b>
<b>MiTOM</b>	-	<b>Metallovedeniye i termicheskaya obrabotka materialov</b>
<b>OiS</b>	-	<b>Optika i spektroskopiya</b>
<b>OMP</b>	-	<b>Optiko-mekhanicheskaya promyshlennost'</b>
<b>PMTF</b>	-	<b>Zhurnal prikladnoy mekhaniki i teoreticheskoy fiziki</b>
<b>PTE</b>	-	<b>Pribory i tekhnika eksperimenta</b>
<b>RiE</b>	-	<b>Radiotekhnika i elektronika</b>
<b>TKiT</b>	-	<b>Tekhnika kino i televideniya</b>
<b>TVT</b>	-	<b>Teplofizika vysokikh temperatur</b>
<b>UFN</b>	-	<b>Uspekhi fizicheskikh nauk</b>
<b>UFZh</b>	-	<b>Ukrainskiy fizicheskiy zhurnal</b>
<b>ZhETF</b>	-	<b>Zhurnal eksperimental'noy i teoreticheskoy fiziki</b>

ZhETF. PvR	-	Zhurnal eksperimental'noy i teoreticheskoy fiziki. Pis'ma v redaktsiyu
ZhPK	-	Zhurnal prikladnoy khimii
ZhPS	-	Zhurnal prikladnoy spektroskopii
ZhTF	-	Zhurnal tekhnicheskoy fiziki

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