NDEA summer institutes at the Universities of Florida and Massachusetts, and at Arcachon, France during 1963 made use of parts of the Audio-Lingual Language Program (ALLP) French Program. Near native pronunciation and intonation habits and a command of the basic speech structures were the goals. Each institute used the Program differently and achieved different results, though in general, students of lower proficiency profited most. Reshaping of pronunciation habits proved very time consuming, but because of the use of programed instruction, larger numbers of pupils could be handled without increase in staff. The program was well-received by participants. Though goals were not reached, improvement in pronunciation seemed greater for most participants than in previous non-programed retraining attempts. (AF)
PROGRAMMED INSTRUCTION IN TEACHER RETRAINING (NDEA INSTITUTES)

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Programmed Instruction in Teacher Retraining (NDEA Institutes)

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The Problem

Teachers trained by the traditional non-verbal approach probably have the greatest difficulty in relearning correct pronunciation. Minimal institutes have rarely been able to impart native-like pronunciation which could serve as a model for their students. Furthermore, much time is wasted in the institute when the student is not able to perceive the correct pronunciation and compare it to his own.

Programmed instruction has been very effective in teaching college students. It was postulated that this particular mode of instruction would prove just as effective in retraining teachers. The ALLP French Program, with its heavy emphasis on discrimination training, was expected to succeed better in reshaping pronunciation habits than all traditional classroom-based approaches.

Programmed instruction was therefore used in three NDEA summer institutes. The following questions were to be investigated: (a) Can incorrect speech habits be changed to native-like pronunciation through a program in which discrimination training is a pivotal factor? (b) How time consuming will this be? (c) What particular problems will arise in this learning situation? (d) Can a larger number of students be instructed than in past institutes with no increase in the number of staff positions?

The Instrument

The ALLP French Program was used. Its objective was to impart to the student near-native pronunciation and intonation habits, as well as the basic structures used in speech as listed in Gougenheim's Le Français Fondamental (1er Degré). It trains the student to generate the French sounds and intonations to a degree of correctness which approaches the speech of a native and with which the student will be accepted by the native as a welcome outsider.

The new pronunciation behavior is shaped through the inherent programming principles, progression by minimal steps at the individual student's pace. Such shaping of behavior requires a great quantity of drill materials but permits even the non-gifted student to advance with a minimum of repetition. It enables the tape recorder to be a teaching machine for each individual student.

The ALLP French Program consists of four parts:

Part I, phonology, teaches a sound or a group of sounds in each of its twenty-five problems through discrimination frames, vocalization frames, phonemic symbol frames and syntax.

1 ALLP stands for Audio-Lingual Language Program. It was prepared under the direction of Professor F. Rand Morton under contract with the U. S. Office of Education. Title VI. OE 3-14-012.
frames. In the discrimination portion the student learns to differentiate automatically between the French phonetic features and those of the English counterpart in order to enable him to monitor and to correct his own speech.

The vocalization frames train the vocal apparatus to generate the French sounds and sequences of sounds. The pitch and stress system (the supra-segmental phonemes) is taught on a syllabic basis, while the overall intonation patterns of the various sentence types are taught only to the extent that the student recognizes and imitates rising and falling patterns of individual word groups.

The phonemic symbol frames teach a phonemic transcription system which is used later to demonstrate the structural changes occurring in the various patterns.

The syntax frames do not teach the structure of the language systematically but rather bring the student to an awareness of the fact that grammar consists of sound shifts and that sounds are used as syntactical signifiers and have meaning in specified environments.

Part II, basic vocabulary, was not used in teacher training.

Part III, the syntactic structures, trains the student to make the appropriate syntactical reply to a given stimulus through pattern drills. Part III also includes forty-eight dialogues intended to increase the student's vocabulary and to relieve the tediousness of learning syntax.

Part IV, conversations, further expands the student's vocabulary through twenty-two short dialogues depicting experiences common to a French native.

The ALLP French Program, or portions thereof, was used at the NDEA institutes at the University of Florida (code 3) and the University of Massachusetts (codes 3 and 4) during the summer of 1963, and at the University of Massachusetts, Arcachon, France, (level 2) institute during the summer of 1964.

Procedures

a. The University of Florida

All twenty-six participants went through Part I of the Program. A profile of each student's speech habits had been established from recordings submitted prior to their coming to the institute and from the oral examination given upon their arrival. This profile contained a detailed error-analysis and a list of the frames designed to remedy the incorrect habits.

Part I of the Program, which was correlated with the course in applied linguistics and remedial phonetics, was the major task during the first half of the institute. The students received explanations about formation of the French sound, its contrast with the English equivalent, and the common errors made. Additional explanations were given to individuals in the laboratory as requested.

The "programmed" tapes were played on inexpensive tape recorders made audio-active without the possibility of recording on the second channel. The student listened to the utterances and repeated them when required. Some students worked with their own tape recorders in the library or in their own rooms.

Each student progressed at his own rate of learning. Some students completed Part I in ten days, and everyone had finished it by the beginning of the fifth week. After completion of the Program, they were tested again through sight reading and a careful error-analysis was made. The student was then advised to continue working on his pronunciation, with particular attention to the errors which had been pointed out and to make daily recordings for critical self-analysis.

The classes in culture and civilization began the first week for the better students and during the third and fourth weeks for the others. The classes in conversation were established immediately, rather than waiting until everyone was ready. It was felt that the participants needed relief from all the drill given in the Program. Free conversation was limited until they were able to express themselves with relatively acceptable pronunciation of controlled materials. No one attended a class in which he would not readily be able to understand the language.

During the second half of the institute, the dialogues of Part III and the conversations of Part IV were used in the conversation classes with further drill in the language laboratory.

b. The University of Massachusetts

At the beginning of the institute, all forty-five participants took the MLA ETS test series. The ALLP French Program, Part I only, was
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then assigned to the participants. Two alternatives were possible: either the participants would work on some problems more peculiar to them, utilizing only portions of Part I, or they would begin with Problem 1 and continue to the end, studying every frame. Because of their very low aural-oral proficiency, it was decided that the ten participants with the lowest scores in the four basic language skills would follow the second procedure. They followed the same schedule as the others but did not attend the regular phonetics class. In addition, this group met in the laboratory during the three hours a week scheduled for these phonetics classes and for one extra hour each day. But everyone worked many additional hours at night in the French House. They were, however, exempted from some co-curricular activities and even from some classes, like Culture and Civilization, when it was felt that they needed more work in phonetics and pattern practice before being able to understand French lectures.

c. Arcachon, France

Only a few tapes were shipped to France, since they were not intended to be used systematically in retraining the participants’ pronunciation. It was assumed that these teachers, having already gone through one institute, would not have any serious pronunciation problem but might benefit from a demonstration of a few tapes and later, perhaps, use the course in their high schools. The first and the last tapes, as well as the tapes dealing with the following sound problems: /i/, /e/, /d, s, n, z/, /l/, /a/, /b/, /e/, /p/ were sent. Eleven tapes altogether were forwarded to Arcachon.

Each participant among those of lower listening or speaking ability listened to tapes daily. Demonstrations in using the materials were given frequently because some participants, in attempting to use a tape without asking for help or advice misunderstood the procedure to be followed and started reinforcing bad habits by repeating all utterances, including those with non-French phonemes or intonation. These errors were detected and remedied from the control desk.

Upon request, the other participants were also allowed to use the Program. Since eleven tapes did not suffice for sixty participants, each tape was played on the master channel and broadcast collectively. This solution did not permit individual work, but was chosen for practical reasons. The nasal vowels were dealt with because they represented a problem to most participants. Emphasis was placed upon frames dealing with intonation, which is perhaps the most distinctive and generally the least taught or drilled linguistic feature, a fact well demonstrated by our own trainees’ performance.

Results

a. University of Florida

The MLA Language Proficiency tests were administered to all participants during the first two days and the last two days of the institute program. Although the tests were not designed to measure the specific items stressed in the ALLP Program they give an overall measure of progress which is based on tangible rather than personal reaction.

A comparison can be made between the Institute of the summer of 1962 and that of 1963 since the language instructional staff remained the same. The only new factor in 1963 was the introduction of the ALLP French Program into the curriculum.

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<th>Average-score gains between pre- and post-test MLA Examinations for the entire French group</th>
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<td>Average-score gains between pre- and post-test MLA scores for group with initial speaking scores between 24 and 32 (lowest group)</td>
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The above results indicate that the overall language progress of the participants in the 1962 and 1963 summer institutes show no significant differences. One must keep in mind, however, that a larger number of participants were instructed in 1963 than in 1962 with no increase in staff.

Groups 4 and 5, which completed the entire Part I and a modified Part III and IV did demonstrate slightly higher gains in speaking than those of the 1962 institute. A radical gain on the speaking test which was predicted by the staff did not materialize. This perhaps was due to the limited scope of the materials of the ALLP Program. The ALLP materials stressed perfection with limited structures and vocabulary rather than mediocre fluency.

The Program was well received by all participants, to a greater degree than had been expected. It was feared that they would not like to be assigned to the language laboratory for up to twenty-five hours per week and might prefer more personal contact with the instructors. Many of them, however, spent more time in the lab than assigned. Upon request, they were allowed to use the laboratory during the evening hours and weekends.

During the first week, Part I of the Program acted as a shock treatment. The first problem proved to be difficult and established the fact that many were not able to discriminate between a French and a non-French sound. The difficulties, however, turned each frame into a challenge. As each student mastered the skill of discrimination, a feeling of elation took over. Many proudly showed the results when for the first time they achieved the criterion score on the first trial.

Great improvement was noted with most students in their control over the sounds and intonation. They were able to discriminate between English and French speech habits and to hear the distinctions the instructor was trying to make much earlier than in previous institutes.

The limitations of the original Program must also be noted. When used for remedial purposes, it did not go far enough to establish the new habits firmly. The frames dealing with rhythm and intonation were based on four- to five-syllable utterances. When the student read longer discourse, when his attention was focused on meaning, etc., he tended to slip back into English stress and intonation habits. The English syllabification habits were carried over into French.

The difficulty of most students in transferring the new discrimination habits to their own speech must be emphasized. Establishing accurate discrimination habits is an essential feature of this Program. Most students did acquire this skill rather rapidly as it concerned other voices. They lost their objectivity when they had to apply it to their own speech. It was only toward the end of the eight-week session that a number would correct themselves while speaking. Many, however, could not pay attention to what they wanted to say and to their pronunciation at the same time.

"Can a larger number of students be taught without increase in staff?" was one of the questions to be investigated. The institute had been planned for thirty students, rather than the twenty of our previous institutes, a fifty per cent increase. Only twenty-six registered, because at the last moment three private school teachers (sisters) withdrew; and one, on arriving, was transferred to Spanish. Four more students would not have affected the Program.

Class attendance totaled eighteen hours a week. Remedial phonetics and conversation were reduced from five hours a week to two hours. The suggestion had been made that the remedial phonetics class be further reduced to two half-hours a week. This reduction of class time laid the burden of learning on the language laboratory. It also altered the purpose of class time to one of testing the student's work, displaying his new skill, and above all, introducing the materials to be learned during the week.

The reduction of scheduled classes permitted grouping the students into sections of five and establishing three sections in culture and civilization, each section with a somewhat different content and presentation. It gave the students the impression of greater personal attention. There is also evidence that the self-correction by the student is at least as effective as the corrections normally made by the instructor. Students did express preference for self-correction in the lab because it removes embarrassment and all psychological difficulties connected with being corrected in class.

b. University of Massachusetts

The following charts compare the results on the MLA Proficiency tests achieved by all institute participants with the results achieved by those who utilized Part I of the ALLP Program.
The students in the experimental group showed their most significant gains in listening and in culture and civilization. Their improvement in listening comprehension is more than twice that of the institute scores. Together with the gains in culture and civilization these achievements reflect the emphasis the Program places on ear training.

The great majority were enthusiastic about the course, in spite of the very heavy burden which caused much fatigue and even some minor nervous reactions. Unanimously, they said that they learned more in this course than in any other course of the institute. Let us not forget, however, that they also worked much more in it than anywhere else. Consequently, these people, in general, showed the greatest improvement during the institute. Many participants who had not been assigned to this group volunteered to do work with it, and many regretted that such a course had not been made compulsory for the entire institute.

As it stands now, the course needs perfecting. Some problems must be reconsidered; general and specific outlines should be slightly rearranged, instructions and explanations could be enriched.

Notwithstanding this weakness in some details, the experiment was a successful one. Most people achieved in only six weeks as much progress as in a regular year course. Two or three could not say a word in French upon arrival at the institute but were able to hold an intelligent conversation with French natives upon completion of the institute. Others have reported that even if they can't speak fluently, they will be able to correct their students' pronunciation.

c. Arcachon, France

Since here the Program was originally intended for demonstration purposes, no objective results can be reported. The observations made above are also valid for a level 2 institute. The primary need is for expansion of the rhythm and intonation exercises with longer sentences drilling various statement, question and exclamation patterns. For the textbook or workbook, it would be desirable to write an introduction presenting articulatory phonetics, and explaining basic phonetic differences between source and target languages, that is, between English and French.

On the other hand, interest in the course was the most prominent result, expressed through the general request to have some sessions of Programmed Course. Many participants seemed to believe that they would find in those tapes the answer to their pronunciation problems. Some recognized that even though their faults had been described and explained to them before starting this Program, they never had been able to achieve correction because they had never heard their own voice in opposition to correct native ones in such a systematic and progressive manner.

Conclusions

1. The students of low or minimal audio-oral proficiency profited most from the French Program, as demonstrated by the scores at the University of Massachusetts.

2. Improvements in pronunciation by most participants, believed to be greater than in previous retraining attempts, have been achieved through the use of programmed instruction. Unfortunately, there is no accurate measurement of the degree of improvement measuring exclusively the features stressed in the ALLP Program. The MLA speaking test measures many other features, such as fluency, vocabulary knowledge, and grammatical structure.
However, automatic native-like pronunciation, hopefully expected by the author of the ALLP French Program, had not been achieved by the students at the University of Florida. The results achieved with a college class using the same program came much closer to such expectations.

3. Reshaping pronunciation habits proved to be very time consuming. It is suggested that if participants could work through Part I of the Program before arriving at the institute, the training received at the institute would be much more effective and the new language habits would last beyond the summer. It is discouraging to listen to students who after two sessions at NDEA institutes still have "difficultés" with the language.

4. The trial use established the feasibility of teaching a greater number of students with the help of programmed instruction with no increase in staff. In fact, in spite of the greater number of students, the individual received more attention from the instructors, particularly in the language laboratory, but also in the smaller and more homogeneous classes.

5. Despite the many hours spent in the language laboratory the Program was well received by the participants.

6. Improvements in the Program and improved equipment and techniques for using the materials will, hopefully, enable the student to come much closer to the goal of permanent native-like pronunciation habits.